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LAKE CARRIERS' ASSOCIATION.

To consider and take action upon all general questions relating to the navigation and carrying business of the Great Lakes, maintain necessary shipping offices and in general to protect the common interests of Lake Carriers, and improve the character of the service rendered to the public.

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COMMERCE OF THE GREAT LAKES.

A suggestion of the extent of the commerce of the great inland sea extending from Buffalo to Chicago and Duluth, known as the "Great Lakes" is supplied by some figures which have been issued by the Treasury Bureau of Statistics, showing the details of the commerce passing through the Sault Ste. Marie canal, which connects Lake Superior with Lakes Michigan, Huron, Erie and Ontario. This necessarily registers only the traffic between the single lake, Superior, with Duluth, as its great concentrating and distributing point, and the chain, Michigan, Huron, Erie and Ontario with Chicago, Detroit, Toledo, Cleveland and Buffalo, the great points of concentration and distribution. The commerce passing through the canal thus registers accurately the movement between the single lake penetrating the wheat and iron producing regions and the chain tributary to the corn, provision and coal producing and iron manufacturing regions. It is the great gateway through which wheat, oats, flour, iron ore, copper and lumber of Montana, the Dakotas, Minnesota and Northern Wisconsin move to the consuming and manufacturing sections, while through the same gateway moves in the reverse direction the coal manufactures and miscellaneous merchandise from Lake Erie and Eastern points.

All of the traffic moving between Lake Superior and the chain of Lakes from Chicago to Buffalo must pass through either the American or Canadian canals which lie side by side. Of the total business through the two canals in 1899, 88 per cent. was carried by the American canal, while of the passenger business 68 per cent. passed through the same canal. It is only by a comparison of figures of 1899 with those of earlier years that the importance of this commerce can be realized, especially as regards its rapid growth. The actual number of passages through the canal, counting each vessel as it passed through it, was 20,055, during 1899, against 9,579 in 1899, having thus more than doubled during a period of ten years. The total freight business passing through the canal in 1899 was 25,255,810 tons against 7,516,022 tons in 1899 showing that the freight tonnage has increased much more rapidly than the number of vessels, thus indicating in some degree the rapid increase in the size and capacity of freight-carying vessels of the Great Lakes. The development of grain production of the extreme Northwest during the decade is indicated by the fact that the wheat carried through the canal in 1899 was 58,297,335 bushels, while 1889 16,231,854 bushels were carried, while grain other than wheat in 1899 amounted to 30,900,935 bushels, while in 1889 it was but 2,133,245 bushels.—Scientific American.

ANOTHER WATERWAY TO THE COAST.

If Canada does not secure the bulk of the carrying trade between the head of the lakes and tide-water, it will not be for lack of systems. A few weeks ago Hon. I. M. Tarte announced his intention of converting North Bay into a lake port. Now a company of United States and Canadian capitalists have been organized to build a railway from the mouth of French river to Quebec. The new line which is to be called the Quebec & Lake Huron Railway Co., will start from the mouth of French river, on the Georgian Bay, and run straight eastward to Quebec, crossing the Ottawa at Mattawa, the Lievre river at Rapide de l'Orignal, and the St. Maurice at Grandes Piles. The distance from Georgian Bay to Quebec will be 440 miles, or 135 miles less than from Parry Sound to Quebec via the Parry Sound and Great Northern railways, which is actually the shortest route between the Great Lakes and Quebec. As regards the trade from Lake Superior and Lake Michigan, there will be a saving of 115 miles of navigation on Lake Huron, as French river is so much higher up the Georgian Bay. The water and rail transportation will, therefore, be 250 miles shorter by the proposed Quebec & Lake Huron railroad than by the Parry Sound and Great Northern. The promoters expect to be able to forward to Quebec, for shipment by the St. Lawrence, either in grain or flour, between 30,000,000 and 50,000,000 bushels of wheat per year, and a great part of the 2,000,000 feet of lumber cut every year in the country traversed by their line.

SUEZ CANAL TRAFFIC IN 1898.

The following statement from the French vice consul at Suez shows the commerce passing through the Suez canal in 1898, by countries, as follows:

Flag.	Number of Vessels.	Total Gross Tonnage.
British	2,295	8,691,092
German	356	1,353,161
French	221	891,641
Dutch	193	526,478
Austro-Hungary	85	300,251
Japanese	46	261,601
Russian	48	248,381
Spanish	49	232,358
Italian	74	208,418
Norwegian	47	109,78
Turkish	54	83,540
Danish	8	30,228
Egyptian	10	15,705
Chinese	4	6,180
American	4	3,161
Greek	2	1,941
Roumanian	1	2,703
Swedish	2	1,020
Portugese	3	605
Argentine	1	450
Total	3,503	12,962,622

It is thus seen that 65.5 per cent. of the total number of vessels and over 67 per cent. of the tonnage was under the British flag, while the German flag covered a little over 10 per cent. of both ships and tonnage. French vessels represented over 6.5 per cent. and Dutch vessels over 5 per cent. of the total number of ships, and the former over 6 per cent. and the latter over 4 per cent. of the tonnage. The remaining 13 per cent. of both the number of ships and the total tonnage was divided among 16 different nationalties.

The lights at Sherwood Point on Green Island and at Menominee are still kept burning, although it is an entirely useless waste of material and energy, there having been no movement among water craft on this bay for nearly two weeks.—The Advocate, Sturgeon Bay, Wis.

DIVERTING LAKE WATERS.

Toronto World: The maintenance of the level of the Great Lakes is a question that is being forced on the attention of the people of both the United States and Canada. There is now before the United States Senate Committee on Foreign Affairs a proposed resolution providing for the appointment of an international commission to examine into and report the diversion of the waters of the Great Lakes. Already one scheme is in operation, viz., the Chicago drainage canal, which is depleting Lake Michigan of its water at the rate of 600,000 cubic feet per minute. Canada is jointly interested with the cities on Lakes Erie and Ontario in maintaining the level of the Great Lakes. The Dominion, we understand has already filed a protest with the Washington authorities, objecting to the diversions of such a large quantity of water from its natural channel. But the Chicago drainage canal is only the first of several other proposed projects involving the diversion of the waters of the Great Lakes. The New York Sun admits that the Erie canal cannot be enlarged, as proposed, without drawing its water supply from the Great Lakes. Other canal schemes depending upon the Great Lakes for their water are the construction of a waterway from Cleveland to the Ohio river; a canal connecting Lakes Superior and Michigan; a ship canal around Niagara Falls, connecting Lakes Erie and Ontario. These are all United States projects. To them must be added the Canadian proposal for the construction of a big canal from Georgian Bay by way of the Ottawa river to Montreal. If these projects were all carried out, or even one-half of them, very little of the water of the Great Lakes would find its way to the sea by the present natural channel. Our new 14-foot waterway would be put out of business with so great a diversion of water permitted as is contemplated by the various schemes. This question of the levels of the Great Lakes is one that may very seriously affect the shipping and commercial interests of this country. The government should not only agree to the appointment of a joint international committee, but it should take active steps to demand such a committee, or it should appoint one of its own to ascertain the effect that these various projects will have upon Canadian interests.

While there is a tendency to divert the waters of the St. Lawrence system in the ways indicated, there is a scheme on foot to preserve and regulate the flow of these waters for the improvement of navigation. The Deep Waterways Commission has reported as practically and desirable the project for maintaining the level of Lake Erie near its high water stage during the season of navigation by constructing a dam across Niagara river below Buffalo harbor. The water lost by evaporation in summer, says The National Geographic Magazine, could be partially replaced by accumulating the surplus water during the closed season and releasing it when most necessary in the open season. The best location for a dam, is, according to the board, at the foot of lake, just below Buffalo harbor. A canal with a lock is provided on the American side around the end of the dam and the rapids at the head of the river. The cost of regulating works is estimated at $796,923 and of the lock and canal at $2,325,967. The changes would raise the low water stage about three feet in Lake Erie, two feet in Lake St. Clair and one foot in Lake Huron.

THE St. Louis Steel Barge Co. will be incorporated with $110,000 capital stock, it is reported, to build and operate a steel barge line between St. Louis and New Orleans. H. S. Potter is to be president, and Alex. McDougall, of Duluth, inventor of the whaleback barges, vice-president. It is said that two steel barges and a tow boat will be constructed at once. The company will erect their own plant at St. Louis. —Iron and Steel, Chicago.

CHICAGO.

Special Correspondence to The Marine Record.

The barge D. L. Filer is in one of Miller Bros. dry docks for repairs and calking.

Chief engineer Wm. Nichols is fitting out the machinery of the steamer W. P. Ketcham.

Capt. Smith sold his steambarge Myrtie Ross to W. E. Hall, of Mount Clemens, Mich.

The machinists employed at the Chicago Ship Building Co.'s yard and shops, numbering over 100 men, struck and left work on Tuesday.

S. R. Gill, for several years steward on the steamer Peerless, has been appointed steward on the steamer Monarch of the Beatty line of Sarnia, Ont.

Capt. Peter Petersen is expending $500 on the schooner Horace Taber, giving her 100 feet of new stringers and rail, new stanchions, bows and knight heads and other general repairs.

Capt. Jacob Jacobson has given the schooner Thos. Howland new hatch coamings and hatches, eight new deck beams, entire new decks, some new outside plank and recalked ceiling and floor.

There has been no charters for grain for some time and the 2¾ cent rate on corn to Buffalo may take a raise as there is not more than 500,000 bushels of vessel capacity here remaining unchartered.

Capt. Martin Johnson has given the schooner Iver Lawson 20 new stanchions forward, 35 feet of new stringers and rail, 40 feet new covering board forward and 3 new planks 40 feet long on the starboard bow.

An independent tug line, with Miles Barry, manager, and Peter Barry, superintendent, has been started here in opposition to the Great Lakes Towing Co. The new line will have five first-class tugs in commission soon.

Capt. George Tebo has resigned his position as solicitor to the New Kentucky Coal Co. The captain has been associated with the several companies carrying on the fueling business at the Central slip C coal dock ever since 1890 and has been very successful.

Capt. W. E. Moore arrived here Tuesday from Cleveland to do necessary repairs and fit out the barge Shawnee, recently purchased by J. N. Haun, of Cleveland, from the Hines Lumber Co. The Shawnee is to be the consort of the steamer James H. Shrigley the coming season.

Capt. Sam'l R. Chamberlain obtained judgment in Judge Kohlsatt's court last week for $2,500 against the Lehigh Valley Transportation Co. for damages to his barge John B. Wilbor, caused by a collision with the company's steamer Saranac at the Illinois Central slip B in September last.

The Barry Bros. Transportation Co. who recently purchased the steamer City of Grand Rapids, at South Haven, will bring her here as soon as the ice breaks up there. Capt. Thos. Barry is fitting her out. She is to run between Milwaukee and Sturgeon Bay, connecting with the company's steamers F. & P. M. No. 1 and City of Fremont at Milwaukee.

Capt. Joseph F. Smith, of Grand Haven, has purchased the passenger steamer R. J. Gordon and is giving her a thorough rebuild and converting her into a steambarge, with a carrying capacity of about 200,000 feet of lumber. She will have her pilot house forward and living rooms below deck aft to give her lots of deck space. Capt. Joe is a great hustler.

THE Canada Atlantic Transit Co. have removed their office to No. 4 Sherman street, on the ground floor. G. J. Harris, general western agent, has had a busy time getting the new office put in shape, which has been done in excellent taste under his direction. The company will run five steamships with a carrying capacity for the season of 100,000 tons more than last season.

Miles Barry, manager of the Chicago & Muskegon Transportation Co. has purchased the steamer Mabel Bradshaw from Hugh Bradshaw. The Bradshaw will run between Chicago and Muskegon in the passenger and freight business in connection with the steamer State of Michigan, recently purchased by the company at Detroit, until a larger steamer which they are negotiating for is procured.

Dutch Fritz, the diver, succeeded in putting two chains forward and aft under the tug Tom Brown, sunk off this port, last Thursday and Friday and two pile drivers raised her from the bottom and all were towed into the basin by the tug Sill, on Saturday. The Brown's pilot house, smoke stack, whistle and exhaust pipe had been carried away and the frames on the port side for seven or eight feet are pushed in and broken.

The Graham & Morton Transportation Co.'s steamer City of Louisville, Capt. John Stewart in command, made her first appearance here this season last Saturday evening with passengers and freight from Benton Harbor and St. Joseph. She left early Sunday morning with a full cargo of merchandise. She arrived again Tuesday morning and will for awhile make tri-weekly trips on Tuesdays, Thursdays and Saturdays to St. Joseph and Benton Harbor.

The Northern Michigan Transpartation Co. have made the following appointments to their steamers: Illinois, Capt. Wm. Finucan, Chief Eng. Thomas Collins; Purser E. A. Weston; Steward Richard Donnelly. City of Charlevoix, Capt. Peter McGuiggan; Chief Eng. James W. Myers; Steward Frank McQuillan; purser not yet appointed. The Company will commence to receive freight here on March 20th and will start running their steamers as early in April as the ice goes away from Northern Michigan ports.

The Goodrich Transportation Co. intend to put three boats on the east shore route the coming season, the new service to leave Chicago for Grand Haven every morning and come direct back every night, thereby enabling the boat leaving here at night to return from Muskegon direct without touching at Grand Haven as formerly, which will be of considerable benefit to the shippers by getting their green stuff and fruit on the market here in the morning. This business is increasing rapidly and has become a very important factor.

The L. M. & L. S. Transportation Co., of which Chas. F. A. Spencer is now general passenger agent, secretary and treasurer, will remove to the Globe dock at 530 North Water street, where they are building a new suite of offices and having the dock enlarged. They have made the following appointments: Steamer Peerless, Capt. H. C. Page; Chief Eng. John R. Bennett; Purser Hawkin Brooks; Steward James Dorsey. City of Traverse, Capt. John M. Twichell; Chief Eng. Edward Mee; Purser C. L. Simmons; Steward T. Matthews. Osceola, Capt. Joseph White; Chief Eng. James Oag. Jay Gould, Capt. Chas. Wilson; Chief Eng. Henry Chalk; Purser A. M. Luckett.

The first of a series of organization mass meetings was recently held by the Milwaukee branch of the Lake Seamen's Union. Similar meetings will be held in all of the lake ports and it is expected that as a result of this agitation the union will increase its membership to 15,000 seamen. It is claimed by the sailors that lake vessels are undermanned; that the crews are too small to handle the vessels properly even in fair weather, and that the large number of accidents and wrecks is largely due to the fact that in heavy weather the demands upon the small crews of lake craft are too great. The union will call attention of the marine insurance companies to the false economy which, it is claimed, is practiced by the vessel owners. The special legislation which will first be advocated is a bill about to be introduced into Congress known as the Manning bill. It provides that a vessel on the Great Lakes shall be compelled to carry a sufficient number of men to properly handle it in fair or foul weather; that the number of men required by various sized vessels shall be fixed by law, and that all men carried for handling vessels shall be expert seamen. It is claimed that many of the sailors now on lake vessels are landlubbers who do not know how to launch a boat or the rudiments of a sailor's craft.

CLEVELAND.

Special Correspondence to the Marine Record.

When bids were opened for the new lighthouse at Toledo the lowest was $98,000. As the appropriation is only $75,000 this amount will have to be increased or plans be prepared for a less costly structure.

The Tyrone Transportation Co., which operate the steel barges Antrim and Tyrone, has been organized by Cleveland and Buffalo parties. The vessels will be handled by Drake & Maytham, of Buffalo. The capital stock of the company is $300,000.

Mr. Al. Peter, Toledo, has purchased the barge Sunshine from the estate of the late C. R. Jones, of this port. The price paid was about $3,000. She will enter the lumber trade between Georgian Bay and Toledo and will be towed by the steamer Saginaw.

Troubles have already commenced in moving the big vessels through Chicago river on account of the current which has been caused by the opening of the drainage canal. A gloomy view is taken by some vesselmen of the prospect of doing business at all in Chicago river after the winter fleet gets away.

The American Ship Building Co. has been asked to make estimates upon the construction of two new passenger steamers for service between Buffalo and Detroit. Wilbur E. Houpt and John Gordon, of Buffalo, are back of the project and it is proposed to construct vessels 470 feet in length over all, 50 feet beam and 29 feet molded depth, with triple expansion engines of 4,000 h. p.

The Brown Hoisting & Conveying Machine Co. is at work on a very complete coal handling plant for the Egyptian State Railway. The plant will cost upwards of $300,000 and will constitute one of the largest machinery shipments ever made from this country. It will be installed at Alexandria. There are six machines capable of handling 3,000 tons of coal in a day of 10 hours. The Brown company has also just made a large shipment to Austria and is filling important orders for firms in China, Brazil and Sweden.

Samuel Mather, H. G. Dalton and other members of the firm of Pickands, Mather & Co., have presented to the Ontario provincial legislature a bill providing for the incorporation of the Mineral Range railroad. The line is designed to open up the newly discovered Michipicoten mining district and provide an outlet for the ore from that section to a shipping port on Lake Superior.

Plans for the cruiser Cleveland have been completed, material is being ordered and her construction will soon be begun by the Bath Iron Works, Bath, Me. The cruiser will be launched in the summer of 1901, and will be christened by some Cleveland girl, chosen by the Secretary of the Navy. About fifteen months will be required to complete the vessel after she has been launched, and she will go into commission in the fall of 1902. At that time, if the custom of other cities in whose honor warships have been named is followed, Cleveland will present the cruiser with a silver service.

A meeting of the central passenger association will be held in Chicago on Thursday of this week. One of the matters to come up for consideration is reduced rates for sailors going to join their boats. Last year, at the close of the season of navigation, a rate of one-half fare was allowed to all of the sailors going home from the port of discharge, provided the sailor had a certificate from his master, or his ship's husband, and countersigned by the secretary of the Lake Carriers' Association. It is expected that this spring about the same rate, under the same conditions, will be made for the sailors going from their homes to the shipping port.

A contract was closed by the Wellman-Seaver Engineering Co., this week, to construct for the Nickel Steel Co., of Hamilton, Ont., a plant that will rival many on this side the line. The site selected is adjacent to the City of Hamilton and located directly upon Hamilton Bay. The tract of land is a large one, and not only are the railroad facilities excellent but the depth of water is such as to enable ore carrying vessels to unload at the plant. It is the present intention to commence the construction of the buildings as soon as the frost is out of the ground and work will be pushed, although no date for the probable completion of the work is given.—Iron Trade Review.

The tenth annual report of the grand lodge, Shipmasters' Association, has just been issued. In the report, President Leisk submitted from George L. McCurdy, of Chicago, a letter directing attention to the undertaking of Chaplain Malcolm McNeil, of No. 149 Weed street, Chicago, for the establishment of a permanent farm home, in which, according to the chaplain's plans, aged and disabled seafarers and the widows and orphans of seafarers will be able to sustain themselves by their labor in cultivating the land or busying themselves in some of the many other avenues which the care of the home provides. There were also submitted to the grand lodge copies of letters from President McKinley and from Admiral Dewey commending the undertaking. It was resolved that the grand secretary should direct the attention of subordinate lodges to this worthy charity, with a view to aiding in subscriptions.

The managers of the docks at the ore unloading ports on Lake Erie have been in conference during the week with representatives of the labor organizations and indications now are that an amicable adjustment of all the principal points under consideration will be reached. The Iron Trade Review says the ore unloaders will be paid at the rate of 14 cents a ton as against 12½ cents at the close of the season last year. The unloading charge for vessels will be advanced from 16 to 20 cents. This apparent disparity in the advance is due to the fact that when the longshoremen were given an advance of 1½ cents per ton last summer the dock managers did not feel justified in advancing the charge for vessel interests. The transportation situation is devoid of developments. Little of the ore still on the market has been covered within the past seven days and there is a growing certainty that vessslmen who have not tied up are waiting for the "wild" market.

Collingwood, the oldest port on the Georgian Bay, has just concluded arrangements with the Cramps, of Philadelphia, by which they agree to establish at that point blast furnaces for the production of iron and steel. The capacity of the plant will be 200 tons per day and will be taken direct from the furnaces and manufactured into sheets, ingots and structural iron. They agree for certain concessions given them by the town to establish a plant costing not less than one and a half million dollars and to employ not less than 600 men continuously for thirty years. The gentlemen composing the company have been going over the ground in Canada, examining the different points, and have come to the conclusion that Collingwood is the best location at which to establish this industry. Canadian ores will be used, and this means the opening up of the vast iron ore deposits to the north of that point, more especially the deposits lately discovered at Michipicoten. Taken in conjunction with the large steel shipbuilding yards which are now in course of construction by Alexander McDougall, of Duluth, at that point, the machinery for which is now on the track and which will be capable of building four of the largest steel steamships at one time, the outlook for Collingwood becoming a large iron working center is very bright. This shipyard will employ about 500 men.

WINTER navigation across Green Bay seems to have been abandoned for this season. The Algomah and one of the Ann Arbors are still frozen in about mid-way across Green Bay, and it will take a powerful ice breaker to release them.

BUFFALO.

Special Correspondence to The Marine Record.

The Richelieu & Ontario Navigation Co., has given to the Bertram Co., of Toronto the contract for a new steamer for Lake Ontario and the upper St. Lawrence. She will be named the Kingston.

Representative Alexander's bill, to establish light and fog stations to mark the main southern entrance of the new breakwater at this port, passed the House this week. It fixes the limit of cost at $45,000.

Organizers of an independent tug company, to give competition to the Great Lakes Towing Co., are believed to be making satisfactory progress, and it is intimated that Joseph A. Sweeney will be president and general manager.

In the action of Henry J. Davis against the Huron Transportation Co., a verdict of no cause of action was returned by the jury on Tuesday. Davis wanted $4,818.44 for a schooner which was lost in Lake Huron while in charge of one of the defendant's tugs.

Capt. Charles Maytham, of the Maytham tug line, has voluntarily raised the pay of the captains of the fleet from $100 to $120 a month, and of the engineers from $85 to $105 a month. This action is most favorably commented upon by the marine men of the water front.

Stewart Murray has resigned from his position of general freight and passenger agent of the Northern Steamship Co. He has been in the lake transportation business for thirty-four years. For twenty-one years he was with the Anchor Line, and since 1892 with the Northern Steamship Co.

The steamer Ed Smith No. 1, which was bought last fall by the lumber firm of White, Rider & Frost of Tonawanda, will tow the barges G. H. Warmington and Edward Kelley in the lumber trade this season. The Ed Smith No. 2 will again tow the Connelly barges—Connelly Brothers, Ogarita and F. B. Gardner. The gardner will dry-dock for an entire overhauling.

Unless present plans are killed by some unforseen contingency, there will soon be established between Buffalo and Chicago a line of modern and luxurious passenger steamers. Such a service has been the pet scheme of Capt. Gordon of the Great Lakes Steamship Co. for several years, but not until within the past year have any definite steps for its establishment been taken.

Leaders of the strike at the Union Dry-Dock yards state that until their demand for an increase in wages is acceded to the strike will continue. They report that the Brotherhood of Boilermakers and Iron Shipbuilders has agreed that none of the members, at any of the ports on the Great Lakes, shall assist in repairing any boats sent from Buffalo for that purpose. Also that Canadian members of the order refuse to come to Buffalo to work in the dry-dock yards or to handle any work sent from Buffalo. Also that the Union Transit Co. has six boats here with boilers all cut apart, and cannot have the boats made serviceable again until the strike is over.

Representative Alexander has introduced into the House a bill which provides for limiting the length of hawsers between vessels towing and being towed, and to limit the width of tows of vessels abreast, within any of the inland waters of the United States under the provisions of the United States statutes approved Februay 19, 1895. Any vessel towing or being towed that violates the regulations of the bill is to be liable to a fine of not less than $50 nor more than $250, one-half to go to the informer. Arrest and seizure is to be made in the same manner and by the same procedure as apply to seizure and arrest for violations of the revenue laws of the United States.

Drake & Maytham announce the following appointments of masters to their line, which now numbers eighteen steamers: Chili, James Gibson; Gratwick (steel), Joseph Hulligan; Maytham, L. B. Cummings; Vega, A. Oldorff; America, Robert Gibson; Brazil, John H. Smith; Lackawana, Frank Weinheimer; Scranton, James H. Greene; Vulcan, John Smith; J. W. Moore, Richard Neville; City of Berlin, John Buie; Case, J. W. Peterson; Russia, John D. Green; Cuba, Robert Young; Alcona, W. T. Sutherland. Schooners, H. W. Sage, John M. McLaughlin; Alta, Louis McNamara. Barges Tyrone and Antrim not appointed. The vessels of the line will be painted uniformly black with white upperworks and will carry a white band around their stacks to distinguish them from others. Fitting out will begin April 1.

"It is to be hoped that nothing will now interfere with Congress making the appropriation this session for the establishment of a marine hospital building at Buffalo this year," said a vessel owner, this week. "Anyone who watches the trend of marine business will have observed that Buffalo's advantageous location at the foot of deep-water navigation on the lakes, and her unexcelled facilities for distribution by rail, are attracting a large proportion of the ore trade. This means a continually increasing marine traffic at this port, and an increasing number of sailors who may require treatment at the marine hospital. It will be a year, perhaps two years, before the marine hospital building could be ready for occupancy, even if the appropriation is passed at this time. In two years it is possible that the demand on hospital service from the water front may be sufficiently great to require accommodation equal to two or three wards in the Sisters' hospital."

DETROIT.

Special Correspondence to The Marine Record.

Last week the Menominee River Lumber Co. sold the 1900 season's cut of box lumber to the Enterprise Box & Lumber Co., Milwaukee. Capt. Jos. Dalton visited Milwaukee and closed the deal. The cut will amount to several million feet.

Ben Trudell, who has been for four years in the life-saving service, latterly as assistant keeper, has received a commission as keeper of the station at Grand Marais, Mich., and has gone there. The new building put up by the government at a cost of $5,000 will be opened for the first time this season.

Two steel passenger vessels, 470 feet over all, 50 feet beam, costing $1,000,000 each and having accommodations for 1,000 passengers, will ply between Buffalo, Mackinaw and Chicago. Work will begin on the vessels in the South Chicago shipyards and they will be launched in May, 1901, in time for the Pan-American exposition in Buffalo. The names of the vessels will be the Great Eastern and Great Western.

The Barry Line will run its steamers north as far as Menominee this season. The boats will make regular trips along the west shore of Lake Michigan and Green Bay. This week a deal was closed whereby the Barry line boats will land at the Hart Steamboat Co.'s docks in Sturgeon Bay. It is expected the boats will land at Penberthy, Cook & Co.'s docks in Menominee. The new line will run one boat a week until business warrants an increase. The craft will be the State of Michigan.

Arguments were commenced at Grand Rapids last week before Federal Judge Severns in the case of the United States versus the Lake Superior Ship Canal, Railway & Iron Co. The Government sues to recover certain land grants made to this concern in 1848 to aid it in building a ship canal across Keweenaw peninsula. The lands have since become valuable, containing vast deposite of iron and mineral, which the government is not permitted to deed away. The lands in question are estimated to be worth from $7,000,000 to $20,000,000.

The Pankratz Lumber Co. have closed a contract with Rieboldt & Wolter, for the construction of two more scows to be added to their fleet. This will make four scows the company will own the coming season, to be used in freighting both lumber and stone, the tug Pankratz and their new purchase, the Duncan City, to tow the same. The new scows will be the same size, dimensions 150x34, the same as the Geo. Dewey. They will be constructed of Georgia pine, and are to be completed some time in June.

Duluth will not lose its hydrographic office. The friends of the office were alarmed for a few days, and it really has looked as if the office must be abolished on account of the small appropriation which is proposed for the support of this branch of the Navy Department. Congressman Morris was appealed to by the friends of the Duluth hydrographic office and other members of the Minnesota delegation in Congress were asked to endeavor to prevent its abolishment. The Duluth Chamber of Commerce passed strong resolutions urging that the hydrographic office be protected and continued. Vessel men and others wired to Minnesota Senators and Representatives and asked them to act in its behalf. At Congressman Morris' request, Senator Davis went before the Senate Appropriation Committee on Naval Affairs and asked that the bill for the maintenance of the Hydrographic Bureau be so modified that Duluth can maintain its office. Senator Davis was successful.

The report that the lumber cut of Georgian Bay this winter will reach 473,000,000 feet is attracting a good deal of attention, especially as the largest previous amount has been not more than 300,000,000 feet. The largest producer is Midland, with 60,000,000 feet, with Victoria Harbor down for 50,000,000 feet, and Bying inlet third with 40,000,000 feet. This last is all due to the operations of the Holland & Emery Lumber Co., of Buffalo, which now for the first time brings its cut to full proportions. While the company has sold a good part of this cut for Canadian consumption, not a little of it will come here for sale. There is a report of the character of a single lumber tow in the trade at a lump sum, but no trip rate has been made yet. Vessel brokers state that they are authorized to write lumber cargo insurance at last season's rates. The lumber rate by lake is not fixed yet. Vessel agents are asking $3 on pine from Duluth and $2.50 from Georgian Bay. There are reports of more than $3 being paid from Duluth to Ohio on pine. As it looks now $3 will be the top figure from Duluth to Ashland.

The conference to decide on the grain contract for the port of Buffalo for this year will open here on Wednesday. It is expected that the first day's session will be largely preliminary. It may be that the meeting will not end before the latter part of the week, and it is the hope to be able to settle all matters touching the grain elevation before this conference is over. Just what will be done is, of course, a matter of conjecture. At any rate the conference is not to be held without representatives of the grain handlers being here, and President Keefe, of the Longshoremen's association has been notified that, in case he cannot get to the meeting, he will be communicated with by long distance telephone before anything is done toward settling the question. Some of the individual vessel owners not on the committee are equally positive with the longshoremen that no contract will be made with the grain handlers themselves, but that it will be elevated this year under the supervision of a contractor, this system to give way to the elevator owners handling their own grain hereafter.

I always like to hear nice words about Mr. Carter. Every time that I go into his office he is willing and courteous enough to tell me anything I want to know. I didn't go to him this week for this item, but I found that Tuesday, February 27, was the sixty-eighth milestone in the life of Mr. David Carter, of Detroit, general manager of the Detroit & Cleveland Navigation Co. Mr. Carter, who is a man of unusual vigor for one of his years, spent the day in his office as usual, receiving many personal visitors and telephonic congratulations from his friends in the city. Mr. Carter will celebrate the forty-eighth anniversary of his service with the D. & C. Co. in April next. In April, 1852, he accepted a position as purser on the steamer Forest City, owned by John Owen and Ira Davis. The Forest City and St. Louis, then owned by Eber Ward, had pooled issues and controlled the route between Detroit and Cleveland. The line was commonly spoken of as the Detroit and Cleveland line, and when, in 1858, the two boats passed under a common ownership, the name became recognized, although the company was not incorporated as the Detroit & Cleveland until 1868. In 1861 Mr. Carter was made agent for the line in Detroit and occupied that position until he became general manager twenty years after. The first boat of the line, the Forest City, cost $44,500, and was considered a palace. The last boat, the City of Detroit, cost $350,000, and would cost to-day $400,000. It is due, to a great extent, to Mr. Carter's excellent executive ability, his happy selection of subordinates and his faculty for making personal and business friends that the line has become one of the strongest transportation companies on the Great Lakes, and so widely known and so highly famed throughout the country.

THE GREAT RUSSIAN DREDGE "VOLGA."

(A CORRECTION.)

To the Editor of the Marine Record:

Will you permit me to make correction of account of the great Russian dredge Volga, designed by my son, Lindon W. Bates, given by Consul W. R. Holloway at St. Petersburg, in your paper of the 8th. Beta is the name of the high powered, multiple suction hydraulic dredge designed and built by Mr. Bates for the United States Government for use on the Mississippi. Volga is the name of the great Russian dredge designed as a great improvement on the Beta. It was the Beta that was to dredge 1,600 cubic yards an hour, with a premium of half the dredge's cost if it should deliver 2,400 cubic yards an hour. This large bonus was easily won simply because great power and efficient machinery were skillfully used. The government engineers were surprised at the success attained. The performance of the Beta ranged from 4,500 to 7,000 cubic yards an hour, according to whether the work was in gravel, clay, sand or silt. The Volga uses eight 20-inch suction pipes and puts the "spoil" at any distance required from the place of operation. She also uses eight propellor wheels, driven by electrical machinery, and thus can keep herself up to her work and move about when necessary.

Your readers wishing more information about this masterpiece of machinery, will find it in Engineering, Dec. 15 to 29, 1899.

WM. W. BATES.

STEAMBOAT OFFICERS APPOINTED FOR THE SEASON OF 1900.

WM. DULAC, Mt. Clemens, Mich.—Str. F. R. Buell, Capt. D. McKinzie; Eng. John Deihl. Canisteo, Capt. C. W. Woodgrift; Eng. C. E. Sylvester. A. Westorn, Capt. B. F. Ogden; Eng. Ed. Cottrell. C. A. Street, Capt. W. J. Lynn; Eng. Frank Thomas. Barge J. Godfrey, Capt. J. B. Lozen. J. B. Lozen, Capt. ———. A. Stewart, Capt. Noah Furton. Eleanor, Capt. Frank Dubay. Jennette, Capt. Richard Moore, Elvina, Capt. Frank Laforge. Fulton, Capt. Eli Furton, W. B. Ogden, Capt. Eli Pettier, S. B. Pomeroy, Capt. W. H. Campau.

THE saving of life at sea is continually being recognized by those nations whose subjects are saved as an international act of heroism which, when these governments are notified of the facts, present a fitting testimonial to the life-saver through the proper authorites at Washington—an international courtesy and appreciation of services rendered by one nation's citizens to those of another. This sentiment should go further, however, and extend to such service rendered by our mariners to their brother mariners. To bring this about it would only be necessary for Congress to set aside a fund for the purchase of life-saving medals of different grades, as the service rendered might warrant, to be presented to American mariners who had been instrumental in saving life at sea, whether American or foreign. While this act might not be the means of saving any more lives, it would certainly give those who had saved life the assurance that their services were appreciated by a grateful nation. We are confident that the Hon. Wm. P. Frye, of the Senate, who has spent his best years in the interests of American ships and American sailors, would advocate such a bill in the Senate. There is no doubt that the senior New York Congressman, the Hon. Amos J. Cummings, who has ever been the stanch friend of the navy, the merchant marine and the pilots, would champion such a bill in the House. If they will take up the matter we are confident that the measure will meet no opposition, so that the future life-savers of this class may be able to give over to the safe-keeping of father, mother, sister, brother, wife, or sweetheart, proof of their having saved a fellow man from a watery grave—.New York Marine Journal.

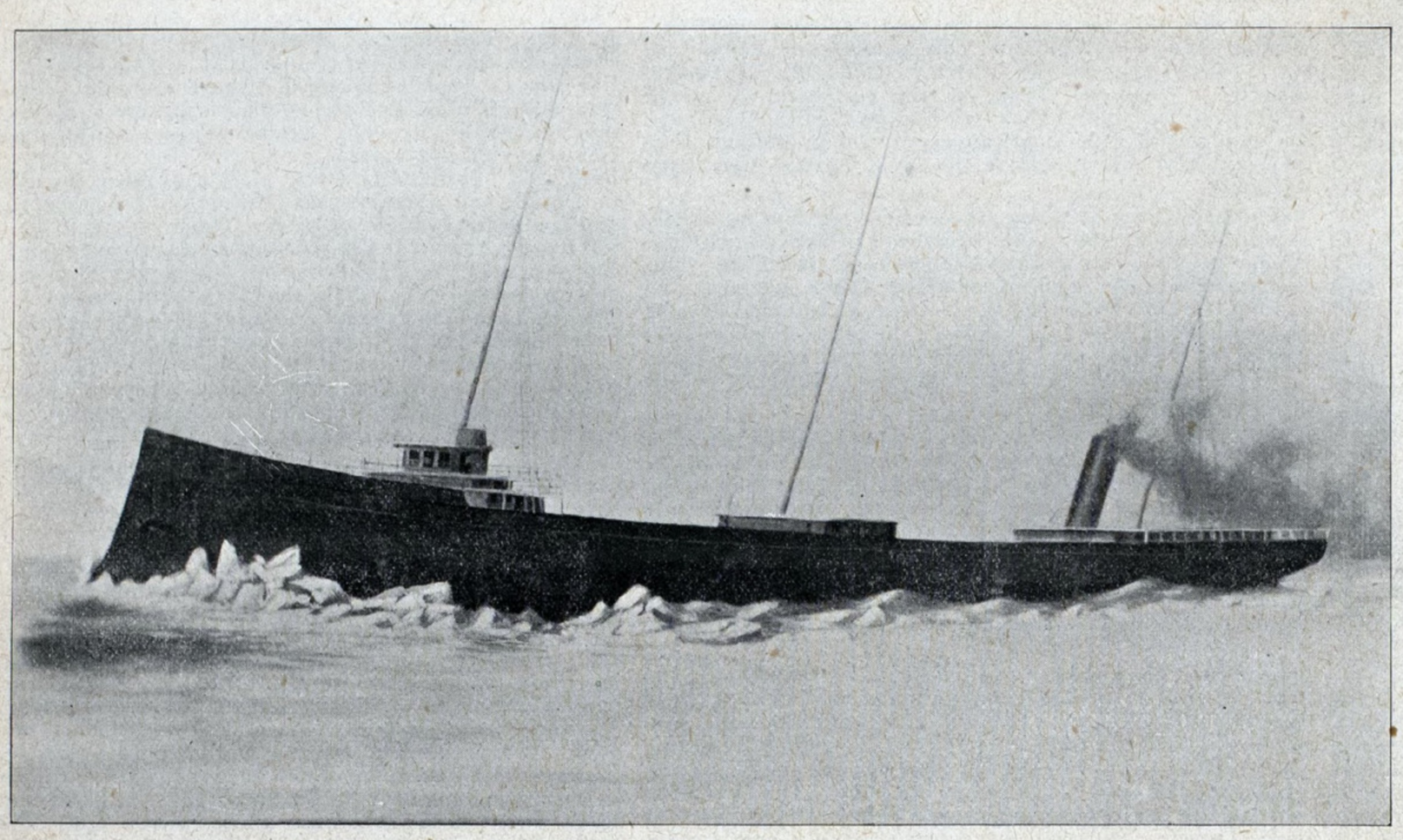
LAKE ORE SUPPLY FOR 1900.

In an article published in Mines and Minerals, Dwight E. Woodbridge thinks the Lake Superior mines will readily respond this coming season to the expected demand for 20,000,000 tons of iron ore. He says: There will be added tonnage from all the Michigan ranges. The Marquette will be able to respond to the spur of increased demand by a production for the first time of more than 4,000,000 tons. Most of this will come from mines that have long been producers, though the new and re-opened properties on various parts of the range will add a share. One group at Negaunee can be looked on for an added production close to 200,000 tons, and an Ishpeming company for somewhat less. The Menominee range will be a larger producer, from its high phosphorus ores of Crystal Falls and elsewhere, and from new mines and re-opened shafts at other points. It should produce 3,500,000 tons.

The Gogebic will probably approximate 3,000,000 tons, with a remarkable addition from one or two properties that have lately shown new value. It will be a surprise if the Vermillion does not reach 2,000,000 tons, considering the developments now going on at its Carnegie mines, which the past year were but partially developed. As to the Mesabi its mines can respond to a demand for 8,000,000 tons with ease, and this without drawing on steam-shovel properties to an undue proportion or without depleting reserves to any improper extent. Indeed a calculation of the probable output of the range, based on the intentions of mining companies and the work of development now in hand, would seem to indicate a larger total than that mentioned.

As to rail transportation there can be no difficulty in moving that amount or more, if other links in the chain are not stretched to the breaking point. These other links are problems of the lower lakes, dock and rail capacity, labor, etc. Labor there has shown signs of unrest during the past season and is now making demands that are unpleasing to contemplate. Railroads were unable the past season to move the freight that offered both to the lower lake ports for transshipment westerly and from the ore-receiving docks to the points of consumption inland.

As to the upper-lake rail problem, it rests in about this manner at the beginning of the year. As far as the mines of Michigan and Wisconsin are concerned, their roads this last year have carried almost exactly 10,000,000 gross tons of ore to lake ports and by all rail to furnaces, and the all rail business of the months from now to the opening of lake navigation in April will leave them less ore to move during the summer of 1900 than they moved in the corresponding time of 1899 in order to make up an even 10,000,000 tons for 1900, which seems to be the figure that common consent has placed as their work for the period in question. Minnesota ore roads were able last year to move with the utmost ease 8,500,000 tons, and had there been shipping available at all times and in proper volume, could have done better. They are now, however, making preparations for a much greater tonnage the present year, and it looks as if they would be prepared to move not 10,000,000 tons only, but a great deal more if such volume is needed. With an increase in rolling stock equal to the capacity of more than 2,000 25-tons cars, with locomotives commensurate to the duty of hauling these cars, with ample increae of docks to care for the added ore these cars can bring forward, and with also a greater proportionate dock storage than ever, it will not be difficult for the three roads of Minnesota ranges to haul to Lake Superior 13,000,000 gross tons in an average season of navigation. It is not well to say they will do this, for probably they will not, but the capacity is there, and besides having its bearing on the situation of the immediate future, it bears an interesting sidelight on what the roads think of the question of ressrves for later years.



PROJECTED ICE-BREAKER.

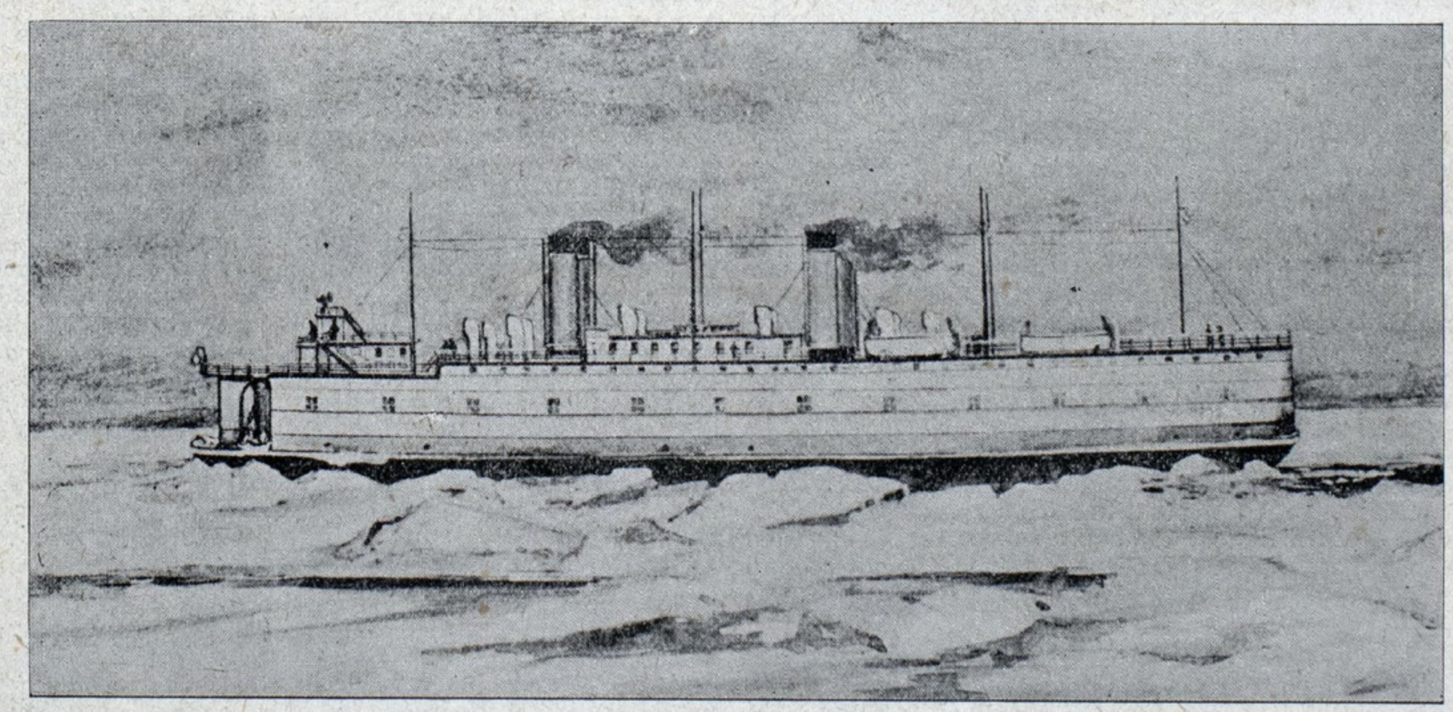
EASTERN FREIGHTS.

Messrs. Funch, Edye & Co. in their regular weekly freight report to the RECORD state as follows: In consequence of more liberal offerings of tonnage, this week's business has been fairly active all along our coast, and, although there is evidently little new business coming on the market, rates throughout for steamers have been well maintained. This proves that the short element has been continuous, and cannot therefore be so promtly eliminated as generally expected In charters for grain we would refer to two fixtures made for Alexandria, with some further enquiry for that port still on the market. The demand for tonnage from the Gulf has been well kept up for this month's and April shipments, whilst the Atlantic cotton ports show no desire for further commitments at present figures. A fair number of time charters has again been effected at improving rates for desirable boats but fixtures from the timber ports are lacking, owing to owners increased demands, which shippers, who are not pressed for delivery, are disinclined to concede. Some boats have been chartered for coal, mainly to be laden in Virginia, and these shipments, unless interfered with by excessive freights, bid fair to broaden and reach new markets in Europe, hitherto not supplied from the United States.

The demand for sail tonnage continues generally fair, and improving in such instances where suitable vessels are obtainable. Although no higher rates have as yet been paid for case oil to the East, prospects point to a slight demand. In general cargo for the Colonies we can report no transactions although the inquiry is fairly active. Lumber freights are firm from the Provinces and the East, as well as from the Gulf, with rates improving. Freights for naval stores are momentarily weak in consequence of the higher prices ruling for these products.

IT IS expected that something less than 2,000,000 tons of ore will be mined and shipped from the northeast shores of Lake Superior, back of Michipicoten harbor, where the Algoma Central Co. have been actively at work the past year, says Mines aud Minerals. This company have very recently ordered fifty 100,000-pound steel cars, and these with the short haul are abundantly able to convey a largevolume of ore to the lake in a season. This company expect to enter the markets of the United States notwithstanding the duty, and will thus come into direct competition with the south shore ranges. There is also a possibility that some ore may be mined in northwestern Ontario the coming season, and this will have a tendency to reduce the shipment of American lake ores to eastern Canadian furnaces, a traffic that has been of some small importance the past year.

WILLIAM A. FAIRBURN, chief draftsman at the Bath Iron Works, Bath, Maine, has declined to accept a more flattering offer made him by the University of Michigan, one of America's largest and most progressive universities. Mr. Fairburn has been offered the position of Professor of Naval Architecture and Marine Engineering at this well-known seat of learning at a large salary, and great efforts have been made to procure his services. Prof. M. E. Cooley, of Mechanical Engineering of the University, visited all the yards and shipbuilding centers in the country to find the right man for this important position, and his choice of a Bath boy highly recommended to him from all parts of the country is extremely flattering to the Iron Works officials and the citizens of the Shipping City. Mr. Fairburn has, however, made up his mind to follow closely the ship and engine building business, although an able instructor. There is probably a brighter future before him in the active business world than there is in the chair of a Western university.—Nautical Gazette.



RUSSIAN ICE-BREAKER.

MARINE LEGISLATION.

56TH CONGRESS, 1ST. SESSION. H. R. 9197.

In the House of Representatives, March 6, 1900. Mr. Boutell, of Illinois, introduced the following bill; which was referred to the Committee on the Judiciary and ordered to be printed.

A BILL.

In relation to suits against steamship companies and other carriers of passengers and freight.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That whenever the death of a person, or an injury to any person, shall be caused by the wrongful act, neglect, or default of any ship or navigation company, corporation, individual, or individuals carrying passengers between the several ports of the United States, or between the ports of the United States and foreign countries, either upon the high seas, or in foreign waters, or the Great Lakes, or whether in foreign or domestic vessels, or caused by or through the wrongful acts, neglect, or default of the servants, officers, or crews of such carrying vessels, actions for damages shall be against such ship or navigation company, corporation, individual, or individuals owning or navigating such vessels, in the courts of the United States, where service can be had on such offending ship or navigation company, corporation, individual, or individuals, under the laws prevailing where suits may be brought, and such suits may be in rem or in personam.

SEC. 2. That whenever the death of a person shall be caused by the wrongful acts, neglect, or default set forth in the first section of this Act, an action therefor shall survive and shall be brought by and in the names of the personal representatives of such deceased persons for the benefit of the next of kin of such deceased person, and either party to such actions shall be entitled to a jury as in suits at common law.

SEC. 3. That the United States district courts in admiralty and the circuit courts of the United States in actions on the case shall have jurisdiction in all such suits, and all actions for such deaths or injuries contemplated by this Act shall be instituted within five years from the time the actions accrued.

56TH CONGRESS, 1ST. SESSION. H. R. 9243.

In the House of Representatives, March 6, 1900. Mr. Alexander introduced the following bill; which was referred to the Committee on the Merchant Marine and Fisheries and ordered to be printed.

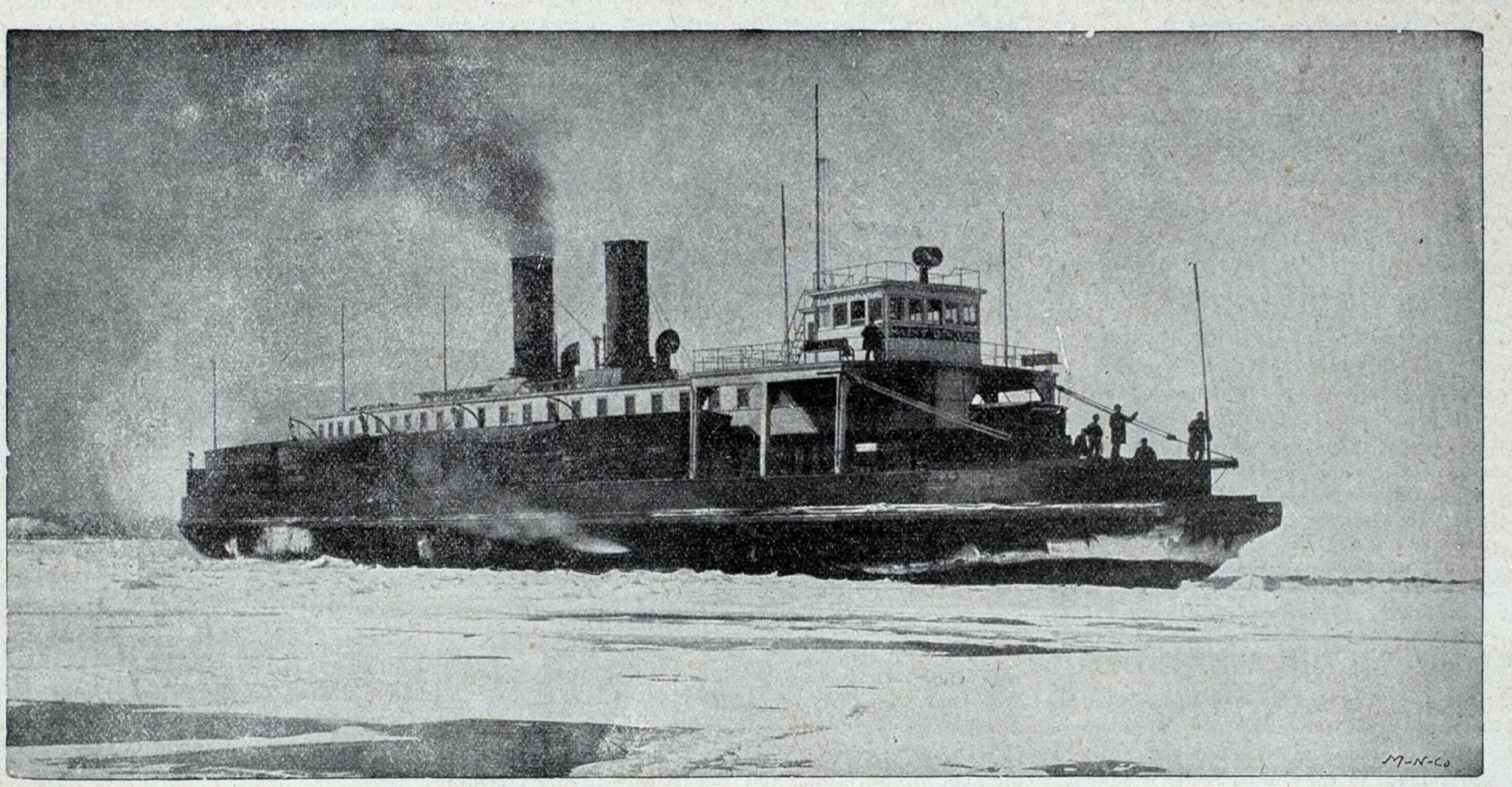
A BILL.

To provide for regulations to limit the length and width of tows in the United States inland waters.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That the Secretary of the Treasury is hereby authorized and empowered, in his discretion, to make, issue, and enforce regulations, which shall have the force of law, to limit the length of hawsers between vessels towing and being towed in train, and the limit of width of tows of vessels abreast, within any of the inland waters of the United States designated as such inland waters by the Secretary of the Treasury, under the provisions of section two of chapter one hundred and two of the laws of the United States, approved February nineteenth, eighteen hundred and ninety-five.

Any vessel towing or being towed upon which a violation of such regulations shall be committed shall be liable to a penalty of not less than fifty dollars nor more than two hundred and fifty dollars, one-half to go to the informer; and the master, or person acting as master, of such vessel shall be deemed guilty of a misdemeanor, and on conviction shall be punished by fine or imprisonment, or both; such fine to be not less than fifty dollars nor more than two hundred and fifty dollars, and the imprisonment not more than six months, at the discretion of the court.

The supervisor of any port, or other official designated by the Secretary of the Treasury to enforce such regulations, or his deputy, shall have authority to make such seizure and arrest in the same manner and by the same procedure as apply for seizure and arrest for violations of the revenue laws of the United States: Provided, That whenever such seizure or arrest is made the person or persons so arrested or interested shall be brought forthwith before a commissioner, judge, or court of the United States for examination of the offenses alleged against him, and such commissioner, judge, or court shall act in respect thereto as authorized by law.



A LAKE ICE-BREAKER AND RAILROAD CAR FERRY.

A SYNDICATE MONOPOLY OF LAKE BOTTOMS.

An Associated Press story published a few days ago in the Chicago Chronicle and other dailies, is considerable of a dream, with not even the slightest tangible groundwork for the dreamer to dream from, or upon.

The story runs about as follows:

"Another field of transportation is to be covered by the syndicates that within the past few months have assumed control of the railroads east of Chicago and St. Louis. Those behind the consolidations have turned their attention to the water lines and are working on a plan to combine the large boat companies on the Great Lakes with the intention of placing these in the big pool with the railroads.

"All the big lines are to be brought into the fold and a common set of rates agreed upon that will not conflict or cause trouble to the all-rail lines from here to the East. It is said that Morgan, Rockefeller, Harriman and Hill are the prime movers in the lake deal.

"In the lake pool Mr. Rockefeller will place his big fleet of ore boats operating between Cleveland and Buffalo, and the ore ports of Northern Michigan and Wisconsin. Hill will add all the big liners of the Northern Steamship Co., including the passenger boats, the North West and the North Land. Morgan will contribute the vessels owned and operated by the Erie and Lehigh Valley roads, and Harriman will turn over the steamers run in connection with the New York Central railroad system. This will include 95 per cent. of all the big boats on the Great Lakes, both freight and passenger."

To those who are thoroughly acquainted with the local conditions ruling the cargo carrying and passenger service on the lakes the foregoing will appear nothing less than ignorantly ridiculous. Perhaps the views expressed by Mr. Fred. P. Gordon, of the Great Lakes Steamship Co., Buffalo, is more directly in line with the situation when correctly stated. Mr. Gordon says:

"The statement regarding a combination in the lake carrying trade seems to me to be absurd on the face of it. So vast and diversified are the interests involved that I doubt if more than 20 per cent. of the total tonnage on the Great Lakes could be brought into any possible combination. To say that it could be made to include 95 per cent. of the freight and passenger business of the lakes is an absurdity on the face of it. I should consider any combination improbable."

The lines that would first be considered in the event of a possible combination are the lake lines that are owned by the railroad companies themselves. They are the Lehigh Transportation Co., the Union Steamboat Co. (Erie R. R.), Western Transit Co. (N. Y. C. R. R.), Lackawanna Transportation Co., the Ogdensburg Co., Northern Steamship Co. (Great Northern R. R.), Clover Leaf Union Transit Co., Anchor line (Penn. R. R.), "Soo" line (B. & O.) lake line, Wilson Transit Co., Canadian Transit Co. and the Canadian Atlantic line. The foregoing are package freight lines and are owned by the railroad companies indicated or, in the case of one line at least, are very closely allied with them. They represent in all, about 100 vessels. The only passenger steamers owned by the lines, are the two of the Northern Steamship Co. and three passenger steamers of the Anchor line.

These boats constitute but a small part of the carrying capacity of the Great Lakes. Many of them are old and of the type that is becoming obsolete on the lakes. With the exception of about 20 vessels the boats belonging to these lines are of 4,000 to 4,500 tons capacity, while the new vessels carry 8,000 tons. In addition to these railroad lines there is the fleet being built by the Rockefeller interest, which now numbers about 20 vessels. It is about five years since Rockefeller became interested in the lake carrying trade.

In opposition to this interest is the Carnegie fleet, which is not so large, but is made up of splendid, large new boats, the peer of anything on the water. Constant additions are being made to this fleet as well as to the Rockefeller fleet.

How the combination could control the passenger trade is still more difficult to see, as there are at least 75 passenger vessels that would be outside the combination against five in it. Notable among the strong passenger lines that the new combination would have to fight are the Cleveland & Buffalo Transit Co., the Detroit and Cleveland Navigation Co., and the Goodrich Transportation Co., controlling the modern passenger vessels almost exclusively.

Admiralty—Maritime Tort.—Admiralty has jurisdiction of an action for injury to one descending from a ship to a wharf by means of the ladder provided therefor, caused by the ladder being negligently left unfastened to the rail of the vessel, it having slipped along the rail while he was descending, and he thrown upon the wharf, and injured there. The Strabo, 98 Fed. Rep. (U.S.) 998.

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NAVAL TONNAGE ON THE LAKES.

Secretary Hay, in his report to the President regarding warships on the lakes, which has been presented to Congress, removes the obstacle which has prevented the navy from using the appropriation made two years ago for the purpose of replacing the antiquated cruiser Michigan with a modern gunboat, and the Navy Department is expected to take prompt advantage of the fact. As now regarded by the State Department, the Rush-Bagot agreement is not the bugbear it seems to be in the estimation of recent Secretaries of State, nor is it any longer believed to prevent the shipbuilders of the lakes from competing for the construction of training ships or torpedo boats, especially when the latter are to be armed only on reaching salt water. Secretary Hay says :

"An agreement was reached between the two governments on May 30, 1898, for the creation of a joint high commission, to which should be referred for settlement various pending questions between the United States and Canada, among which was a 'revision of the agreement of 1817, respecting naval vessels on the lakes.' "

The instructions given to the American members of this joint high commission on the subject referred to in the resolution of the House of Representatives as representing the views of the government of the United States were that it was desirable to secure a declaration or recognition that it was not contrary to the true spirit and intent of the arrangement of 1817 to build vessels of war upon the Great Lakes or in its ports, provided they were not to be used or maintained upon those lakes. It was held that the evident meaning of the arrangement, especially when read in the light of the correspondence leading up to it, was that only such armed vessels as described should thenceforth be maintained in those waters. Lake Ontario was shut up by the rapids of the St. Lawrence and by Niagara Falls; the lakes above Lake Erie were shut in by the flats of the St Clair river, and Lake Superior, in turn, was separated by the rapids of Sault Ste. Marie. There was, therefore, no navigable connection between them and the ocean. Under such circumstances, to build and arm vessels on the lakes meant "to maintain" them there and to use them for no other purpose than as part of the permanent armament. The language of the treaty, therefore, was not improper at the time to convey the idea intended.

Moreover, at the time of making the arrangement the region of the Great Lakes was in large measure an uninhabited wilderness. Today the lakes are highways for an enormous traffic, and their ports are great centers of manufacture and industry, and can afford to the United States facilities not dreamed of in 1817. They have, among other things, peculiar advantages for the construction of certain classes of war vessels, and their facilities in this respect are capable of large extension, and of a development which, in the future may be of inestimable value to the United States.

For these reasons the government of the United States regarded it as entirely consonant with the spirit of the arrangement of 1817 to use these naval facilities, and to do so upon a full understanding with Great Britain that its building of war vessels on the lakes is in no way hostile to the arrangement, or intended to increase the permanent armament to be there maintained. The American members of the joint high commission were therefore instructed to secure some agreement whereby, under proper conditions, such vessels should be constructed and passed through the Canadian canals to the ports of the United States on the Atlantic ocean.

It was likewise held that a proper construction of the arrangement did not prohibit the maintenance on the lakes of vessels properly equipped for the purpose of training seamen and reserves in the middle states, and that the employment of a proper training ship is not necessarily hostile to the spirit of the arrangement and should be so declared.

It is understood that some satisfactory progress was made in the joint high commission toward the attainment of these ends, but the labors of the commission have been suspended without reaching a definite result.

REVENUE CUTTER SERVICE.

The Treasury Department will open bids for another revenue cutter vessel to be located on the Pacific Coast, on April 3. The new cutter to be located on the lakes, for which bids have just been opened, will be a single screw steel propeller of about 620 tons displacement. Dimensions will be 178 feet long over all, 30 feet molded beam, and 15 feet depth to the base line. The stem will be slightly ram-shaped. The hull is divided inte compartments by four water-tight bulkheads. Quarters for the officers are located on the berth deck, aft of the engine compartments, and quarters of the petty officers and crew forward of the boiler compartment. The accommodations for the crew, as well as for the officers, are comfortable, and every care has been exercised to make the conditions of life on board ship as pleasant as possible. To this end shower baths and running water have been provided for the crew. Provision will be made for carrying a certain amount of sail, principally to be used for steadying purposes in a seaway. The propelling machinery of the vessel which is expected to give a speed of 14 knots at full power, was designed by Capt. John Collins, engineer-in-chief, who also has charge of the electric light, sanitary and steam heating systems and the inspection of all material. The vessel will be fitted with steam steering gear, steam windlass, fire and flushing pumps.

WESTERN PROGRESS.

"The Grain Trade of the United States" is the title of a report just published by the Treasury Bureau of Statistics as the first of a series of studies upon the production and transportation of the great staples. The present article points out the rapid and continuous westward shifting of the area of cultivation, and the changes in the routes by which western grain has reached the eastern consumers and the European markets. After the completion of the Erie canal, in 1825, and the settling of the Lake Michigan territory, the great bulk of the western grain traffic moved eastward over the lakes and the canal, and New York became the great grain shipping port of the country. The discussion shows how from Chicago a network of railways radiated to all points and acted as tributaries to the lake, and later how the unified and amalgamated railways competed with the lakes for the eastbound traffic. The traffic in corn and flour was diverted from the lakes to the railroads, and while the lakes regained part of this lost traffic later, the Erie canal was unable to compete with the railroads from Buffalo ; and grain which formerly reached tidewater at New York is now largely diverted to Philadelphia, Baltimore, and more southerly ports. The struggles of the railroads and of the ports among themselves are described and the history of the existing rate differentials is given, but the report confines itself to history and does not discuss policy or forecast future developments.

The report also presents what appear as the two most recent developments of the grain trade of the United States : Firstly, the partial diversion of the wheat and flour trade from Lake Michigan to Lake Superior ports and the rise of a great milling industry at Minneapolis and Duluth-Superior; secondly, the increased movement of grain (and notably of corn) to the Gulf ports, partly by river, to a greater extent by rail from St. Louis and near-by points, and to an ever-growing extent by direct rail routes from cities in the northwestern corn belt.

The statistics contained in this report show that the exportation of grain is increasing with great rapidity, that both the production and exportation of corn are assuming a greater volume, and that a constantly growing portion of our wheat is exported in the form of flour. During the last 32 years the amount of corn produced has increased from 868 to 1,924 millions of bushels, an increase of 122 per cent., while the exports of this cereal increased from 16 to 177 millions of bushels, or over 1,000 per cent. During the same period our production of wheat increased from 152 to 675 millions of bushels, a gain of 344 per cent., while our exports increased from 12.6 to 222.6 millions of bushels, or almost 18 fold, and our net exports of this grain increased at a still more rapid rate.

The year 1898 shows the United States to be easily the first wheat-producing country of the world, our production amounting to 675 million bushels, or nearly one-fourth (23.4 per cent.) of that of the whole world. Russia (both European and Asiatic) is second with 17.3 per cent., then France with 12.9 per cent., British India with 8.4 per cent., and Austria-Hungary with 5.9 per cent. Our precedence in wheat production is largely due to our immense tracts of available fertile land, our admirable transportation facilities, the remarkable system of handling the grain, both physically and commercially, and the exceedingly low freight rates which obtain on our railroads and lakes.

VAST BEDS OF COAL.

A Pittsburgh, Pa., paper says: "Within the next year local railroads will have connection with coal beds sufficient to supply abundant traffic for 300 years. Every hollow and ravine leading to coal deposits in Washington, Greene, Fayette, Westmoreland and Indiana counties is to be utilized as a grade for coal roads which will be branches of main lines. The Baltimore & Ohio, Pittsburg and Lake Erie and Pennsylvania systems will lead in developing coal traffic, but the Pittsburg, Bessemer & Lake Erie will not neglect to obtain its share of the business, and, as previously stated in this department, the Carnegie company will arrange to build a line to reach the vast coal beds in the region between Oliver and the Wheeling & Pittsburg branch of the B. & O. system.

"It has been estimated that branch lines now being constructed within 50 miles of Pittsburg will develop over 4,500 square miles of territory underlaid with the famous Pittsburg coal bed. This bed is 11 feet thick on the average, and as each square mile of a coal bed of one foot in thickness contains 1,000,000 tons, we find that in the region named there are 9,900,000,000 tons of bitumen. In 1885 the Pennsylvania geologists estimated the amount of bituminous coal in Southwestern Pennsylvania at 5,000,000,000 tons, but they did not take into consideration some workable beds at different elevations which have been discovered in the past five years, so that the estimate of nearly ten billion tons of coal in the region is not exaggerated.

"This represents an amount of freight which can barely be imagined, and staggers the comprehensive power of the average calculator. It means enough freight for all the Pittsburg roads for the next 100 years, no matter how their facilities for transportation may be increased, and enough fuel underground to maintain the prestige of Pittsburg as a manufacturing region for another century to come, without figuring on the other coal beds in this part of the state, and the vast deposits in West Virginia, not far from the Pennsylvania line, which have only been merely touched so far, and are sufficient to supply the wants and requirements of this territory for thirty years to come."

THE NEW YORK SHIP BUILDING CO., which is establishing an extensive works at Camden, N. J., has been making rapid progress. The weather has made it possible for work on all the structures to advance rapidly all winter. There have been very few days when outdoor work had to be wholly suspended because of the cold, and only brief periods when ice in the Delaware river interfered with the operations of the wharf and dock builders. As a result, it is expected that the company will be ready to begin the actual work of ship construction by May 1. Indeed, it is stated semi-officially that plans for a large steel steamer have been in preparation for some time and that the work of construction will begin early in the spring It is also understood that the company will bid on the next naval order for which the United States government invites bids.

PRESENT AND FORMER NAME.

Few people, even among the number whose interests are marine, have any accurate knowledge of the great number of lake vessels which for various reasons are given a change of name by their owners. Believing that a list of the steamers and schooners now sailing under another name than that first bestowed will be of interest to a large number of lake men, the Buffalo Courier, through the kindness of Capt. Fitzpatrick of the the Clover Leaf line, prints the names below. This list simply includes the vessels which have had a rechristening within the past ten years.

Considerable red tape surrounds the matter of changing a vessel's name. Application for a permit to do so is first made by the owner to the Collector of Customs at the vessel's home port, and through the latter officer to the Secretary of the Treasury at Washington. A good reason for the change must be presented and the boat under consideration must be perfectly free from debt. As follows is the list, the present name of the vessel appearing first in each instance :

Steamers—A. A. Parker was Kasota; Agnes Arnold, Bob Mills; Alpha, Shaugraum; Argo, Leila; C. E. Benham, E. M. Peck; Caledonia, William B. Morley; Calumet, Lancet; Caprice, Henry Douglas; Charleston, Came Stewart; Charles O. Smith, L. S. Durage; City of Charlevoix, Champlain; City of Green Bay, M. C. Hawley; City of Louisville, R. C. Reid; City of Sandusky, Jay Cooke; City of the Straits, City of Detroit; Coaster, Fred Tank; Commodore, O. B. Green; Edward Watkins, Gen. W. W. Belknap and also Gen. A. A. Humphrey; Edward H. Jenks, E. M. Foster; Ella G. Stone, E. L. Mason; Empire State, Sylvan Stream; Empress, Sophia; F. W. Gillett, Odd Fellow; Fannie H., Mamie; Florence Yates, Samuel H. Barons; Fritz Karste, R. Davis, G. J. Dorr, Gertrude; Gossoon, Bertie; Gov. Morton, Australia; Grace, Mon Lilly; Grace A. Ruelle, John Nice; Greyhound, Northwest; Henry, George A. Dickson; Henry Cort, Pillsbury; Idlewild, Grace McMillen; Island Belle, Island Wanderer; J. C. Ames, J. C. Penett; J. H. Upham, Jr., M. R. Swan; J. S. Blazier, H. A. Ballentine; James Beard, Wesley Hawkins; James D. Heilson, Washburn; Jesse Spaulding, Henry Marshall; John Otis, G.J. Truesdale; John Spry, May Durr; John C. Pringle, W.H. Gratwick; John E. Moore, Only Son; John H. Pauly, Thomas Kingsford; Lewiston, Susan E. Peck; Lizzie Madden, Chenango; Lucille, Pick Up; McCormick, A. A. Enstophiera; Marquette, Republic; Mary Virginia, George W. Lormer; Maryette, Liberty H. Ware; Mentor, Hattie A. Fox; Monahansett, Ira H. Owen; Morning Star, Athello; Munson, Two Brothers; Nettie Denessen, Schiller; Norseman, Enterprise; O. M. Field; Cora Fuller; Pacific, Sphynx; Ald. Rocks, B. J. Moore; Pathfinder, J. A. Crawford; Peter Smith, Ada; Phœnix, Waldo A. Avery; Waneka, Laura; Wayne Isabel, T. R. Merrill; Maynard, Winifried; White Star, J. Maria Scott.

Schooners—Amboy, Helena; Argo, Lizzie T. Davis; Arthur, G. C. Trumpff; Canton, China; G. W. Waghtin, R. C. Crawford; Checotah, George D. Russell; Charles C. Buell, Erie Queen; Dan Mabee, I. M. Hill; Ebenezer, Watts Sherman; Eugenia Vesta, Russie; Eureka, Schilde; George Sturgess, Higgie & Jones; George W. Johnson, D. W. Powers; Grace Greenwood, Search; Hattie Hutt, F. B. Stockbridge; Horace Taber, Bessie & Essie; Horace A. Badger, Kate Gillett; Iron City, Daniel E. Bailey; Iron State, G. S. Hazard; J. E. Potts, Mohawk; James G. Blaine, Pensaukee; Jay Bird, Lady Essex; John C. Bauer, Planet; Lillie E., Louisa McDonald; Wissahickon, Edward Kean; Lizzie P. Betts, Miami Belle; Lydia E. Raesser, Gipsey; Madeline T. Downing, Mary Copley; Massasoit, Jessie Linn; Metacomet, Iron State; Mike Corey, J. O. Thayer; Nelson Bloom, Meteor; R. Kanters, City of Woodstock; Tasmania, James Couch; Thomas Dobbie, Comanche; Vega, St. Paul; W. W. Stewart, W. J. Spicer; Wanesho, Nabob; Wm. Brake, L. Gardner.

AS A result of the passing of the deficiency appropriation bill, which allows $2, 500,000 for work on vessels, orders have been issued to resume work at the Navy Yards and many men will be employed. At the Boston Yard there are the Olympia, Topeka, Chesapeake, Vesuvius, Sterling, Peoria and some tugs; at Portsmouth, N. H., the Raleigh; at New York the Indiana, Massachusetts, Cincinnati and several torpedo boats; at Norfolk the Newport, Annapolis, San Francisco, Terror, Puritan, Reina Mercedes and some converted yachts and tugs; at League Island the Miantonomah, Minneapolis, Columbia and Katahdin; at Mare Island the Boston, Philadelphia, Mohican and Alert.

SHIPBUILDING IN 1899.

According to a consular report from Bremen on the shipbuilding record of the past year, the United Kingdom still leads in tonnage output. In 1899 British shipyards turned out steamships to the amount of 1,414,000 tons, and sailing vessels to the amount of 2,000 tons, or 1,416,000 tons altogether, exclusive of warships. This, the report states, was "one-fifth less than the entire steamship fleet of Germany." Warships were turned out to the amount of 168,000 tons, making the grand total of construction for the year 1,584,000 tons. Of the warship tonnage, 121,000 tons were added to the English fleet. Most of the remainder (42,000 tons) was for Japan, while 4,000 tons were for the United States.

Of the 1,416,000 mercantile tonnage built in the United Kingdom in 1899, the portion built for Germany was 68,000 tons; for Austria, 37,000 tons; for Norway, 28,000 tons; for Spain, 26,000 tons; for Denmark, 24,000 tons; for Holland, 22,000 tons; for Russia, 15,000; for Sweden, 9,000 tons. Of the remainder 1,149,000 tons were added to the British mercantile fleet and 18,000 tons went to British colonies. Other countries built together 881,000 tons—503 merchant vessels and 56 warships. Germany built 252,000 tons, the United States, 233,000 tons; France, 155,000 tons; Italy, 67,000 tons; Holland, 39,000 tons, and Russia, 34,000 tons. The tendency towards larger vessels, as being most profitable, is shown in the fact that of the steamships built in the United Kingdom nine were over 10,000 tons, six were over 12,000 tons, and the Oceanic was of 17,274 tons. Germany produced the Patricia, of 13,293 tons; the Grosser Kurfurst, 12,500 tons, and six other vessels of over 10,000 tons.

THAT FORWARD WHEEL.

The following comes from the St. Ignace News :

That interesting article entitled, "Mammoth Ice Breakers" which appeared in the Detroit Free Press Sunday last, was, no doubt, as interesting to its many readers elsewhere as it was to us who live here at the Straits; and it would doubtless have been even more interesting had the discovery and utility of a "forward wheel" as an ice crusher, which has proven so great a success in the steamers St. Ignace and Ste. Marie been correctly given.

All the older citizens of Mackinac Island which at that time was the only port on the Straits, remember the time when the steamers of the old Northern Transportation Co., would, on reaching the Straits in the early Spring and finding the ice too heavy for a single boat to push through, lash their bows together and the one push the other through the ice stern first, while both work their engines ahead, the former under a full head of steam, the latter under check. Wm. Marshall, keeper of Round Island Light House, says he has seen these boats work their way through ice 30 in. thick in this manner, and that this practice commenced about the year 1852. Mr. Marshall came to Mackinac in the first fine passenger steamer that was built on the lakes the "Genessee Chief," and arrived here in May 1848, and since that time resided there. He further says that many of the officers of these steamers belonging to the Northern Transportation Co., are still alive, and that the practice of lashing their bows together to work through the ice in the Spring lasted for many years.

Capt. John McCarty, of Mackinac Island, is another who watched the feats of the little northern boats, and was mate of the Algomah at the time Mr. McCool states he "conceived the idea" from a "tug making a current to carry sewage," and ex-Mayor Thos. F. Madden, of St. Ignace, was the dynamite expert that Mr. McCool speaks of. Madden and McCarty were out on the ice with a crew of men trying to blast a passage for the boat when McCarty stated to Madden that "if he was master of that boat he would work her through that windrow stern first in two hours." Mr. Madden communicated this to Supt. McCool and he in turn sought further information from mate McCarty, with the result that he ordered Capt. Ames to turn the Algomah around and proceed, under McCarty's instructions, stern first. Capt. Ames said the boat could not be turned around, but McCarty finally took charge of the whole job and worked the boat through the ice just as McCool described, except that it was not Supt. McCool's idea at any stage of the proceedings.

We have heard the story of the "forward wheel" told so often during our twenty years stay on the island, by our most reputable citizens, that it seems hardly reasonable that Mr. McCool would attempt to appropriate any of the credit for inventing that very useful piece of machinery.

We might have let the matter drop unnoticed, were it not for the attempt to mix our beautiful crystal-like ice and blue water of the Straits with the filthy sewage contained in the Hamburg canal in Buffalo.

Miles E. Barry, manager of the independent tug line at Chicago, has written the independent tug lines to co-operate with him in opposing the Great Lakes Towing Co., "which is going to use its wealth and influence to crush the independent towing companies." Mr. Barry claims that his line can tow 10 per cent. cheaper than the Great Lakes Towing Co., if all the independent lines will co-operate with him.

NOTES.

ACTING on the suggestion that some projection on the blades of propellers would give them a better grip of the water, F. S. Snowdon and W. J. Orr propose fitting two battens on each propeller blade. These will be roughly L-shaped, and will thus form two channels which will prevent the water slipping off the blades in the easy way of an ordinary propeller. They will not only prevent the circumferential "throwing off" of the water, but by setting the battens with their trailing ends nearer to the center of the shaft than their leading ends, they tend to throw the water in toward the center, and thus give more solid water for the propeller to work in. The inventors state that in the case of a small craft tried in New Zealand waters, the fitting of the battens increased the speed of the vessel by over 10 per cent. without any increase in the number of revolutions run by the engines, the same propeller and load being used in each ease.

THE tenth annual meeting of the British Corporation for Survey and Registry of Shipping was held on Feb. 21st., Mr. Nathaniel Dunlop presiding. Mr. Sloan, in submitting the annual financial statement, said that the balance sheet for the year ending Dec. 31st showed that the Corporation was in a very satisfactory position. The following gentlemen were elected to the Committee of Management : Messrs. Hogarth, Riddle, Mann, Clark, Mackie and Brook. Mr. George Smith was elected to the vacancy on the directorate caused by the death of his father. In the course of his address the chairman said that they had on their books upward of 600 vessels, representing about one and a half million tons, and during last year they had assigned load-lines to 153,918 tons, and added 106,234 tons to their register. Mr. Archibald Denny, chairman of the Scientific Committee, and Mr. Courtier-Dutton, Chief Surveyor, also addressed the meeting.

A WOODEN vessel, 172 ft. long by 33 ft. beam by about 16 ft. draught, is about to be built by the Dundee Shipbuilders' Co., Dundee, for Antarctic exploration purposes, and to the order of the Expedition Committee, of which Sir Clements Markham, president of the Royal Geographical Society, is chairman. The vessel's displacement will be 1,570 tons, and the hull is to be constructed generally of oak, with an outer sheathing of greenheart. It will be specially strengthened to withstand ice pressure. A magnetic observatory is to be fitted up on the upper deck amidships, and, to obviate any magnetic interference, all metal fitting for a radius of about 30 ft. are to be of brass. The deck is to be lined with asbestos, and the machinery will be placed aft, in order that the observatory amidships may be free from undue magnetic influence. The vessel, which will be barque-rigged, is to be completed by March, 1901. The engines are to be supplied by Messrs. Gourlay Bros. & Co., Dundee.

THE dry dock for which the Morse Iron Works & Dry Dock Company has just purchased a site at Bay Ridge, near New York will be the largest dry dock in the United States. It will be almost twice the size of the dock now being used at the plant of the William Cramp & Sons' Company, and will accommodate with ease the largest vessels in the world. Contracts for all the material, with the exception of lumber, have been placed, and 1,5 o men will be put to work at once driving piles and erecting the workshops and electric plant. The electrical operation of the dock will be a new feature. A man at a switchboard will simply have to press a button and the gates will be raised and the pumps set in motion automatically. Even the scraping of the vessels will be done by a new electric system. It is not the intention of the company to stop at that and within the next two years the dock will be doubled in size, making it the largest dry dock in the world.

MARINE PATENTS.

Patents on marine inventions issued Mar. 1, 1900. Reported especially for the MARINE RECORD. Complete copies of patents furnished at the rate of ten cents each.

645,070. External leak-stopper. Antoine Colomes, St. Etienne, France.

645,221. Water-wheel. S. J. Tutthill, Oakland, Cal., assignor to the Tutthill Water Wheel Company, San Francisco, Cal.

645,225. Boat-pump. M. M. Cullen, New Cumberland, W. Va.

645.337. Centerboard for boats. C. J. Smith, Holly, N. Y.

645,354. Propeller for steamships. C. R. Emrich, Norfolk, Va.

644,723. Metallic life-boat. W. S. Ray, San Francisco.

644,943. Diving and submarine apparatus. Giuseppe Pino, Genoa, Italy.

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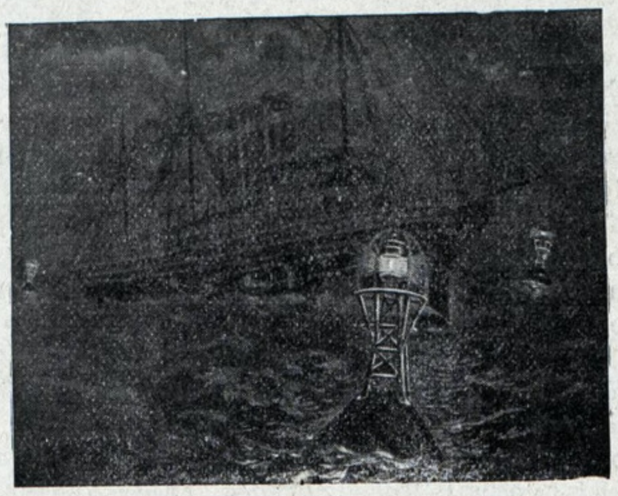

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WAR SHIPS IN THE GREAT LAKES.

(EDITORIAL, NAUTICAL GAZETTE.)

War ships built and operated upon the Great Lakes may be a near possibility, according to a report sent to Congress by the Secretary of State. Though Mr. Hay carefully avoids any prediction, his report has a tenor that is unmistakable. He has written in answer to a letter from Senator McMillan, of Michigan, who was pushing the bill for the replacement of the old steamer Michigan by a new and up-to-date cruiser. This was a year ago, and the naval reserves of Illinois, Michigan and other states were anxious to hear the result of this investigation. The Rush-Bagot treaty of 1817 has all along been the obstacle to the construction of ships of war on the lakes, and also caused trouble about the transfer of armed revenue cutters through the rivers and canals bordering Canada during the late war.

Secretary Hay says that the history of the negotiations which led up to the Rush-Bagot treaty was sent to Congress by Preseident Harrison, in December, 1892. His report today tells about the creation of the high joint commission and the bearing this commission has upon the present problem.

Secretary Hay says:

"An arrangement was reached between the governments of Great Britain and the United States on May 30, 1898, for the creation of a high joint commission to which should be referred for settlement various pending questions between the United States and Canada, among which was a revision of the agreement of 1817 respecting naval vessels on the lakes.

"Instructions given to the American commissioners on the subject referred to respecting the view of the government of the United States were that it was desirable to secure a declaration or recognition that it was not contrary to the true spirit and interest of the arrrngement of 1817 to build vessels of war on the Great Lakes or in its ports, provided they were not to be used or maintained upon those lakes. It was held that the evident meaning of the arrangement, especially when received in the light of the correspondence leading up to it, was that only such named vessels as described should thenceforth be maintained in these waters.

"In 1817 the Great Lakes were independent inland waters. Lake Ontario was shut up by the rapids of the St. Lawrence river and Niagara; the lakes above Lake Erie were shut in by the rapids of the St. Clair river, and Lake Superior in turn was separated by the rapids of Sault Ste. Marie. There was no navigable connection between them and the ocean.

"Under such circumstances, to build and arm vessels on the lakes meant to maintain them there, and to use them for no other purpose than as part of the permanent arrangement. The language of the treaty, therefore, was not improper at the time to convey the idea intended. Moreover, at the time of making the arrangement the region of the Great Lakes was in a large measure an uninhabited wilderness. To-day the lakes are highways for enormons traffic and their ports are great centers of manufacture and industry, and afford to the United States facilities not dreamed of in 1817.

"These lake have among other things peculiar advantages for the construction of certain classes of war vessels, and their facilties in this repect are capable of large extension and development, which in the future may be of inestimable value to the United States. For these reasons the Government regards it as entirely consonant with the spirit of the arrangement of 1817 to use those naval facilities, and to do so upon a full understanding with Great Britain that its building of war vessels on the lakes is in no way hostile to the arrangement or intended to increase the permanent armament to be maintained there.

"The American members of the commission were therefore instructed to secure some arrangement whereby under proper conditions such vessel should be constructed and passed through the Canadian canals to the ports of the United States on the Atlantic Ocean.

"It was likewise held that a proper construction of the treaty did not prohibit the maintenance on the lakes, of vessels properly equipped for the purpose of training seamen and reserves in the middle states, and that the employment of a proper training ship is not necessarily hostile to the spirit of the treaty, and should be so declared. It is understood that some satisfactory progress was made toward the attainment of these ends, but the labors of the commissioners have been suspended without reaching a definite result."

STEAMBOAT INSPECTION RULES.

No supervising inspector shall make his annual report public until after the same has been presented to the Board of Supervising Inspectors, as required by section 4410, Revised Statutes; and, further, that no local board, or the clerk thereof, shall make public any report without the consent of their supervisiug inspector or that of the Supervising Inspector-General.

LOCAL INSPECTORS OF STEAM VESSELS MAY FURNISH THE PUBLIC PRESS CERTAIN INFORMATION.

TREASURY DEPARTMENT,
STEAMBOAT-INSPECTION SERVICE,
OFFICE OF THE SUPERVISING INSPECTOR-GENERAL,
WASHINGTON, D. C., May 22, 1897.

Geo. H. Starbuck, Esq., Supervising Inspector, Second District, New York, N. Y.

SIR: Complaint having been made by persons connected with the public press that the regulations referred to in Department Circular 143, dated September 27, 1893, amending Rule 12 of Department Regulations of December 30, 1892, in relation to giving out information, are unnecessarily rigorously observed by the local inspectors in the second supervising inspection district, I would advise you to instruct the officers referred to that, as there are many matters of public interest coming before them that can be and should be communicated to the public through the representatives of the press, they are hereby authorized to give such information freely, in accordance with their best judgment, as to carry out the true spirit and intention of the regulations referred to herein.

Reports of all accidents and collisions received by inspectors particularly, should be freely given to agents of the press upon application.

Respectfully yours.
JAS. A. DUMONT,
Supervising Inspector-General.

Approved:
L. J. GAGE, Secretary.

VISIBLE SUPPLY OF GRAIN.

As compiled for THE MARINE RECORD, by George F. Stone, Secretary Chicago Board of Trade.

CITIES WHERE STORED.	WHEAT. Bushels.	CORN. Bushels.	OATS. Bushels.	RYE. Bushels.	BARLEY Bushels.
Buffalo	861,000	10,000	111,000	63,000	517,000
" afloat	204,000	205,000	.....	.....	.....
Chicago	14,530,000	4,952,000	1,765,000	250,000	21,000
" afloat	85,000	3,584,000	549,000	.....	.....
Detroit	459,000	264,000	48,000	6,000	20,000
Duluth	12,794,000	911,000	169,000	405,000	178,000
" afloat	248,000	.....	.....	.....	.....
Fort William, Ont.	3,178,000	.....	.....	.....	.....
Milwaukee	258,000	4,000	2,000	12,000	22,000
" afloat	.....	189,000	793,000	.....	.....
Montreal	55,000	21,000	399,000	14,000	28,000
Port Arthur, Ont.	215,000	.....	.....	.....	.....
Toledo	792,000	2,074,000	129,000	7,000	.....
Toronto	62,000	.....	4,000	.....	42,000
Grand Total	53,698,000	21,060,000	6,401,000	1,170,000	1,061,000
Corresponding Date, 1899	29,799,000	34,033,000	10,613,000	1,528,000	2,605,000
Increase	.....	1,394,000	343,000	.....	.....
Decrease	386,000	.....	.....	6,000	189,000

While the stock of grain at lake ports only is here given, the total shows the figures for the entire country except the Pacific Slope.

ENGLAND builds battleships complete, with guns and all, for $360 per ton of displacement. France pays $450 per ton, and Russia's new ships cost about $500 per ton.—New York Marine Journal.

SHIPPING AND MARINE JUDICIAL DECISIONS.

(COLLABORATED SPECIALLY FOR THE MARINE RECORD).

Collision—Determination of Fault—Evidence Considered.—Evidence considered, and held to establish that a collision between two schooners meeting in the evening was caused by the vessel having the right of way changing her course after the vessels were within sight of each other. The Mary Manning, 98 Fed. Rep. (U. S.) 1000.

Charter Party--Stipulations Inconsistant with Lien.—Where a charter party provides for the payment of a fixed sum, to be made in advance, and at a particular place, such stipulation will be held to be an implied waiver of the charter's lien for unpaid arrears of hire, and payment thereof cannot be demanded elsewhere and at other times. The Moringen, 98 Fed. Rep. (U. S.) 996.

Wharves—Injury to Vessel.—A boat which came in on Sunday, and, without the knowledge or consent of the wharfinger, occupied a pier which had been closed for repairs, to the knowledge of her owner, and which had not in fa t been reopened, did so at her own peril, and cannot recover for injuries received through the incompleted condition of the pier. Meritt & Chapman Derrick & Wrecking Co. vs. Schermerhorn et al., 98 Fed. Rep. (U. S.) 746.

Construction of Contract—Vessel to be Safely Delivered in Port.—A salvage contract, by the terms, of which no payment for the services rendered was to be made unless the vessel was delivered "safely" in port, does not require that she shall be delivered without injury, where, at the time the contract was made, she was grounded in such a position that she was continually receiving injury, but only that she shall be delivered in a safe place. The Thornley, 98 Fed. Rep. (U. S.) 734.

Reasonableness of Contract.—A contract for the payment of $20,000 for salvage services, contingent upon their success, is not so exorbitant that it will not be enforced, where the vessel, which, with her cargo, was of the value of $105,000, was grounded upon a dangerous reef, where vessels had previously gone to pieces, where there was no other assistance available, and as as a result of the services both vessel and cargo were saved, with slight loss. The Thornley, 98 Fed. Rep. (U. S.) 735.

Collision—Evidence Considered—Burden of Proof.—Where a steam ferryboat, navigating in a fog at night, on hearing the fog signal of another vessel, apparently forward of her beam, which was recognized by her pilot as that of another ferryboat, whose course was such as to cause danger of collision, failed to stop her engines at once, as required by article 16 of Act June 7, 1897, the burden rests upon her to show that the collision which followed was not due to her neglect. The St. Louis, 98 Fed. Rep. (U. S.) 750.

Seamen—Suit for Wages—Effect of Statutory Release.—A release signed and attested as required by Rev. St. § 4552, without fraud or coercion, by seamen, on payment to them of wages conceded to be due them for a voyage, is conclusive upon them as a settlement of all claims on account of such wages, and the fact that they greatly needed the money paid them does not amount to legal duress or coercion; nor is the release rendered invalid because the master was not then present, but, after signing it on his part, had gone on another voyage. The Pennsylvania, 98 Fed. Rep. (U. S.) 744.

Collision—Tugs Crossing—Injury to Tow.—Where one of two tugs approaching each other on crossing courses at night and under difficult conditions of the tide, signaled her intention of crossing the bow of the other tug, when she could with greater safety have slackened speed and passed under her stern, she is chargeable with sole liability for a resulting collision by which one of the barges she had in tow was injured, the other tug being shown to have taken the best course possible to assist the maneuver after receiving the signal. Tice vs. The Zouave and The Sea King, 98 Fed. Rep. (U. S.) 746.

ICE REPORT OF THE LAKES.

(U. S WEATHER BUREAU).

The conditions have not changed materially on Lake Superior, some open water is reported to the eastward of Two Harbors with large ice fields over the east end. The ice in St. Mary's river averages from 22 to 24 inches and extends to the mouth of the river. On Michigan the ice-fields have moved off the shore and the fields are not so heavy in the south end; it is breaking up about Manitou Island. The ice at the Straits ranges about 20 inches, but there is more open water off Cheboygan. The ice-fields have increased in Lake Huron but the conditions are unchanged at the southern end. In Lake Erie there is less ice reported at Huron, Lorain and Ashtabula, while the conditions are unchanged at Cleveland and Buffalo. The ice in Ontario appears to have been driven by the wind into Mexico Bay, as very little ice is reported from the west end. The cold weather of the 11th and 12th has stiffened the ice some in all the lakes.

The usual details follow:

LAKE SUPERIOR.

Duluth—Harbor ice ranges from 27 to 32 inches; the outside field averages 14 inches near Duluth and extends to Two Harbors.

Two Harbors—Ice solid from here to Duluth; to the eastward ice breaking up and considerable open water visible.

Bayfield—Ice 20 inches thick and no water visible.

Ashland—Ice 28 inches thick and thawing some.

Eagle Harbor—Ice as far as can be seen; some open spaces to the northward, but solid to the east.

Pequaming—Conditions unchanged.

Marquette—Ice in harbor and bay still solid; high winds of the 9th carried the field ice out about six miles.

Deer Park—The high south winds have carried the ice-fields out into the lake.

Whitefish Bay—The bay is solid with ice 15 inches; out in the lake large fields are moving to and fro.

Sault Ste. Marie—Ice increasing slightly. In Hay Lake it is from 22 to 24 inches; in lower Mud Lake about the same. The ice in the river appears to be of even thickness this winter.

LAKE MICHIGAN.

Manistique—No ice in harbor, or in the lake.

Gladstone—Ice 28 inches thick.

Escanaba—Ice 25 inches and solid.

Menominee—Ice ranges from 14 to 20 inches and is still firm.

Sturgeon Bay—Conditions unchanged; ice firm.

Green Bay—Ice 11 inches and solid.

Kewaunee—No ice in harbor and only a small amount of slush ice floating in the lake.

Milwaukee—Ice from 10 to 14 inches thick inside the breakwater.

Racine—Harbor clear; large amount of broken ice in the lake.

Chicago—Northeast winds have driven slush ice into the harbor and along shore; field ice extends out about two miles, and floating ice for about 15 miles.

Michigan City—Ice in harbor 8 inches; large ice-fields in the lake shifting with the wind.

South Haven—Ice 8 inches in harbor, and extends two miles out.

Saugatuck—Easterly winds have driven the ice off the shore and none is in sight.

Holland—Channel is blocked with slush ice which is softening; very little ice in sight in Lake Michigan.

Grand Haven—No ice in harbor; field of ice some miles out in the lake but is well broken up; vessels have no difficulty in getting through it.

Muskegon—Ice in harbor 11 inches.

Ludington—Harbor ice 20 inches, some slush ice around the entrance.

Glen Haven—Very little ice in the bay and no ice between South Manitou Island and Sleeping Bear Point.

Mackinaw City—Steady cold weather holding ice in the Straits in same condition as last week.

LAKE HURON.

Mackinaw Island—Ice extends about three miles to eastward of the island. The warm weather of the 8-9th melted the snow so there is very little covering.

Detour—Ice in river ranges from 8 to 20 inches and extends to the lake; open water in the lake.

Cheboygan (9th)—No ice in sight in Lake Huron from Lighthouse Point.

Alpena—About half of Thunder Bay open. The ice extends beyond Middle Island as far as can be seen, solid for about four miles out and broken up beyond that; some open water to the south with floating ice-fields.

East Tawas—No change in ice conditions.

Bay City—Condition of ice unchanged.

Harbor Beach—Very little ice in sight outside of the harbor, the strong westerly winds carried it out into the lake; harbor ice softening.

Port Huron—No open water in sight in the lake during the week; St. Clair river open from the lake to some miles below the city.

DETROIT RIVER—The river is open from Lake St. Clair to Sandwich Point; ferries have no difficulty in crossing.

LAKE ERIE.

Toledo—The bay is reported frozen over; ice probably five inches thick; the ice in the river is broken down to a point about two miles above Madison street, and danger from flood appears to be past.

Sandusky—Harbor ice ranges from 8 to 20 inches; ice extends into the lake as far as can be seen; teams crossing from Kelly's Island to Marblehead and to Sandusky.

Put-in-Bay—Ice in harbor 12 inches; south passage still closed and is solid between Bass Islands and as far north and west as can be seen.

Huron—Ice moved out of harbor on the 7th; is still piled on the shore varying from 6 to 18 feet; open water two miles out.

Lorain—Ice in harbor all broken up and moving out; ice-field in the lake soft and no obstruction to tugs going out or in.

Cleveland—No open water in the lake at this point since the 6th; ice in harbor 5 inches.

Ashtabula Harbor—Ice in river very soft; south winds have blown most of the ice off shore; ice broken up.

Jester—Ice breaking up fast; some water in sight.

Erie—Ice in harbor 10 inches and beginning to soften; the lake appears covered with ice as far as can be seen.

Buffalo—Harbor ice 12 inches; in the lake it is still firm.

LAKE ONTARIO.

Fort Niagara—River still jammed with ice from Lewiston to Youngstown; lake clear of ice except some along the shore.

Charlotte—Ice in harbor 6 inches and quite soft; not so much ice in the lake as at last report.

Sodus Point—Ice 8 inches in the harbor; the south winds have driven the ice-fields from shore.

North Fair Haven—Harbor ice solid; small amount of floating ice in the lake.

Oswego—High winds have moved ice-fields from the harbor; there is a large amount of ice in Mexico Bay and around the islands at the foot of the lake.

Cape Vincent—No water in sight; ice protected by 18 to 24 inches of snow.

NORMAN B. CONGER,
Local Forecast Official, Marine Agent.

Chief engineer John Chapman is fitting out the machinery of the steamer Iosco and getting some work done on her boiler at Chicago.

TREASURY DECISION.

COLLISIONS OF VESSELS TO BE ENTERED IN OFFICIAL LOG BOOKS.

TREASURY DEPARTMENT, BUREAU OF NAVIGATION,
WASHINGTON, D. C., February, 27, 1900.

To Collector of Customs, U. S. Shipping Commissioners, and Others:

The act of February 14, 1900, relating to log entries of collisions of vessels, provides, that section forty-two hundred and ninety of the Revised Statutes be amended by adding the following:

Twelfth. In every case of collision in which it is practicable so to do, the master shall, immediately after the occurrence, cause a statement thereof, and of the circumstances under which the same occurred, to be entered in the official log book. Such entry shall be made in the manner prescribed in section forty-two hundred and ninety-one, and failure to make such entry shall subject the offender to the penalties prescribed by section forty-two hundred and ninety-two.

SEC. 2. That this Act shall take effect sixty days after its passage.

The manner of making the entry is set forth in the official log book, which embodies a copy of section 4292, Revised Statutes.

You are requested to furnish to masters of vessels a copy of this circular. Shipping commissioners will place a copy in each official log book issued.

EUGENE T. CHMBERLAIN,
Commissioner.

Approved:
O. L. SPAULDING, Acting Secretary.

ERROR IN NEW PILOT RULES.

The Supervising Inspector General Mr. Dumont has sent out the following notice to the masters and pilots of steam vessels on the Atlantic and Pacific Coast inland waters, calling attention to the error in printing one of the new rules, as published by the Department.

"You are informed that, in transcribing the amendment to Rule II., Pilot Rules for Atlantic and Pacific coast inland waters, as published in italics in Department Circular No. 12, dated Febuary 7, 1900, page 7, and the Treasury Decisions dated February 15, 1900, page 10, the words "so as to cross the stern of the other steamer" were inadvertently placed after the word "port," whereas they should have followed the word "starboard" where that word occurs in the fifth line of said Rule II, in Department Circular No. 12 and in the seventh line of Rule II, of the Pilot Rules, in the Treasury Decisions heretofore referred to.

"Following is the rule as it was intended by the Board of Supervising Inspectors to read; and it will be so printed in the new edition of the Pilot Rules.

PILOT RULES FOR ATLANTIC AND PACIFIC COAST INLAND WATERS.

"Rule II. When steamers are approaching each other in an oblique direction, as shown in the diagrams of the fourth and fifth situations, so as to involve risk of collision, the vessel which has the other on her own starboad side shall keep out of the way of the other, which latter vessel shall keep her course and speed; the steam vessel having the other on her starboard side indicating by one blast of her whistle her intention to direct her course to starboard, so as to cross the stern of the other steamer; and two blasts, her intention of directing her course to port, which signals must be promptly answered by the steamer having the right of way, but the giving and answering signals by a vessel required to keep her course shall not vary the duties and obligations of the respective vessels."

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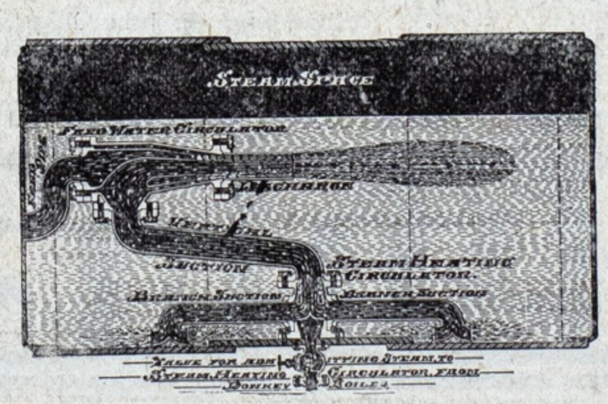

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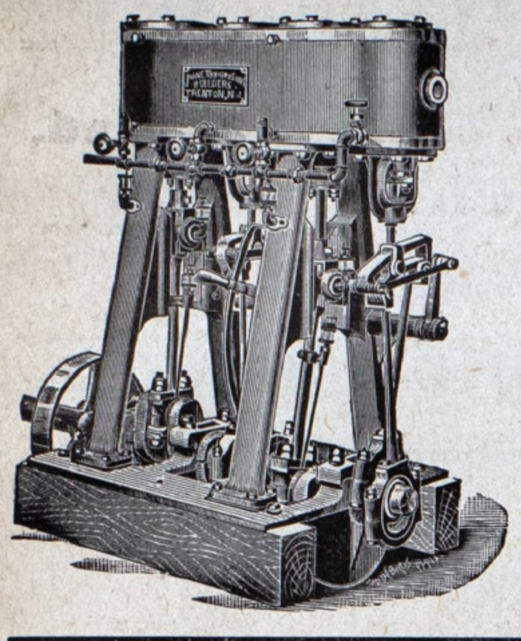

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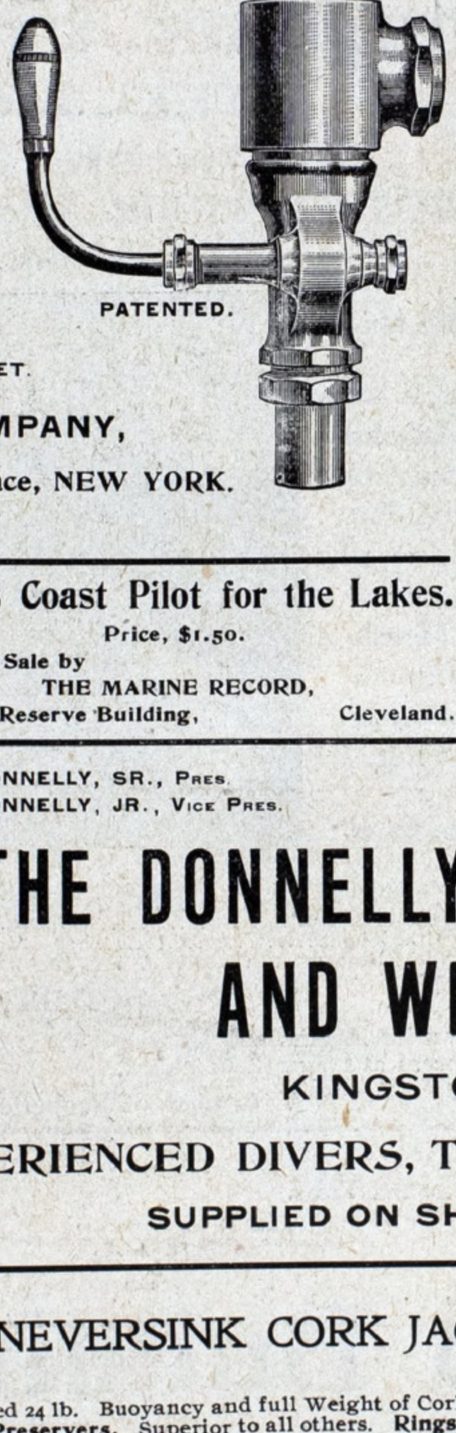

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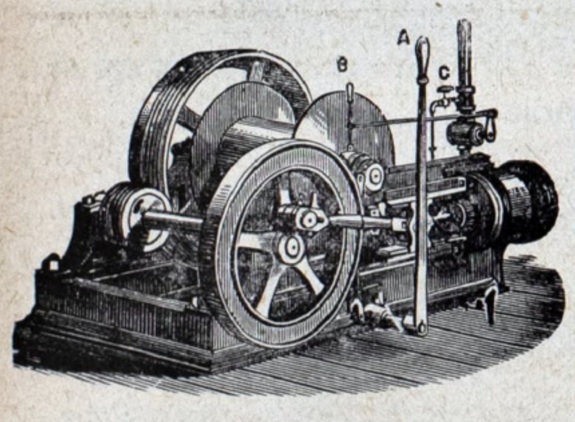

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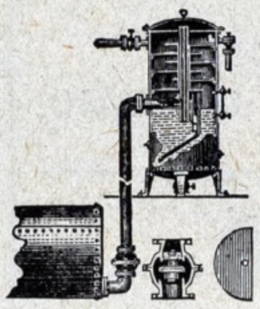

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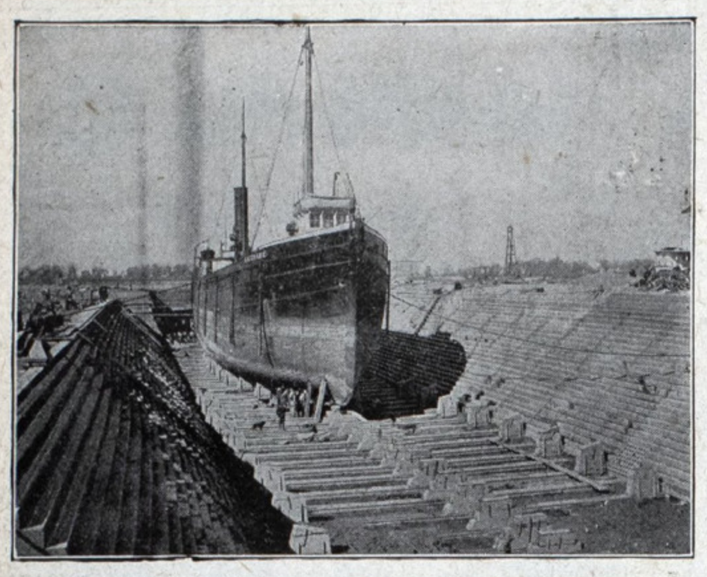

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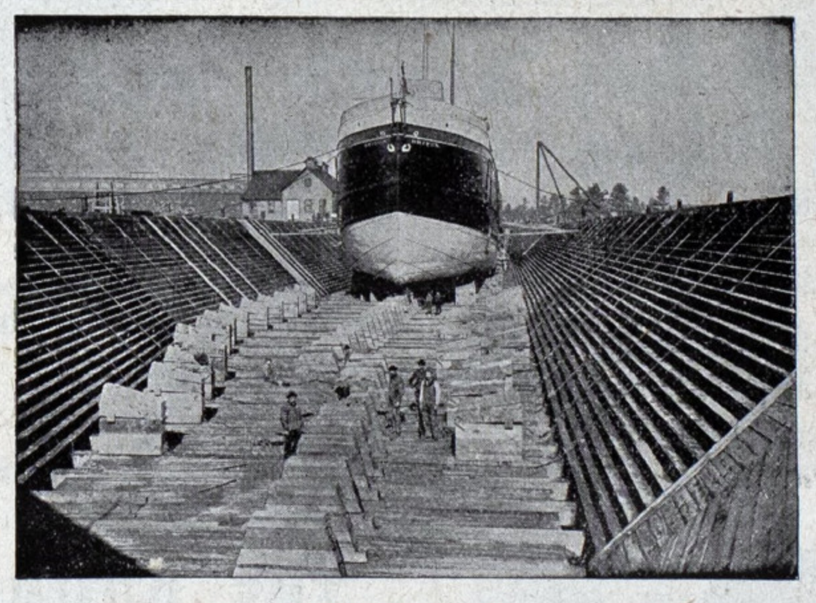

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